Acquired Language Disorders as Barriers to Effective Communication

Emily Ayieta Ondondo
Jaramogi Oginga Odinga University of Science and Technology (JOOUST), Kenya

Abstract—Communication is a complex process that involves various fundamentals. It not only involves different elements but also entails speaking, listening, writing and reading. Effective communication can be curtailed by a number of factors stemming from either the elements of the communication process, the participants, the communication environment or all of these. Language is a vital element in effective communication because communication is predominantly facilitated through language. Communication breakdown is witnessed in communication events involving people with fully developed proper language functions. Therefore, it is logical to argue that effective communication would be severely impaired in communication events involving people with language disorders. However, as the literature reveals, little has been done to find out how acquired language disorders affect effective communication. Adopting a descriptive design, this paper determines whether acquired language disorders pose any barriers to effective communication, what type of barriers they are and how the barriers affect communication effectiveness. It shows that acquired language disorders create process, semantic and psychological barriers that hinder effective communication at crucial stages in the communication process. The barriers generated prevent proper encoding, transmission and decoding of the message. The paper then provides some suggestions on how to improve effectiveness.

Index Terms—communication, barrier, language, disorder, aphasia

I. INTRODUCTION

Understanding communication and how it works is important to human beings. This is because everyday activities and functions involve some form of direct or indirect communication. Regardless of the activity or function, the participants in a communication event communicate with and through other participants. As a result, every participant’s communication skills affect the effectiveness of any communication event (Brun, 2010; Summers, 2010). It, therefore, seems reasonable to argue that one of the most inhibiting forces to the effectiveness of any communication event is a lack of effective communication (Lutgen-Sandvik, 2010) and that good communication skills are important to ones success as a participant in a communication event.

Human communication, however, is faced with a lot of problems and difficulties. Misinterpretations and misunderstandings arise more often than not. This is because whenever people try to communicate, something often seems to get in the way and they are not understood in the way they intended. Even when there is understanding it is often hard to get people to think or behave the way one would wish them to and this is largely dependent on the objective of the communication. For communication to be effective a message must be understood, accepted and acted upon (change behavior or attitude), if this does not happen communication has failed and participants in a communication event get frustrated and resentful (Ondondo, 2014; Stanton, 2009).

The message that is to be communicated occurs as a thought in the mind of the sender. This thought has to be converted into an expressible form (code), that is, words and/or gestures (Chomsky, 1986; Ondondo 2014). Words constitute language, which is a code that can only be understood if both parties give the same meaning to the symbols that are used. Language is stored in the brain of human beings in form of lexical items and rules that determine how these items structure and function. To produce real speech these items are retrieved from the brain and structured according to language specific rules. In this way language, thought and the brain are interrelated because they have to work together as a system in the production of speech or writing.

Language is the primary form through which messages (whether spoken or written) are expressed in communication. Language is therefore central and vital to communication. This then implies that language disorders would have a negative effect on communication. However, little has been done in finding out how language disorders affect communication (Ondondo, 2014). As a result there is no research empirical or non-empirical endeavouring to answer this question that the author of this paper is aware of.

In this paper, therefore, I set out to determine and explain how acquired language disorders affect communication. I discuss how acquired language disorders are barriers to effective communication and provide suggestions on what can be done to improve communication effectiveness. I begin by briefly explaining what communication is and the process by which it occurs in section 2. In section 3, I provide a summary of the main types of barriers to effective communication. In section 4, I describe the main acquired language disorders. In section 5, I discuss how acquired language disorders are barriers to effective communication, highlighting what type of barriers they are. In section 6, I
provide some suggestions on how to improve effectiveness. Finally, I give a conclusion to the paper in section 7 and suggestions for further research in section 8.

II. THE COMMUNICATION PROCESS

Communication is defined by Keyton (2011) as the process of transmitting information and common understanding from one person to another. The definition accentuates the fact that unless a common understanding results from the exchange of information, there is no communication (Lunenburg, 2010).

There are important elements of the communication process, as figure 1 identifies (Cheney, 2011; Lunenburg, 2010).

The communication process consists of six important elements, as figure 1 above shows: the sender, the message, the medium, noise, the receiver and feedback. However, the key elements in any communication event are the sender and the receiver (Lunenburg, 2010). The sender, as the person who has a need or desire to convey an idea or concept to others, is the initiator of the communication. The receiver, on the other hand, is the individual to whom the message is sent.

The sender encodes the idea or concept by selecting words, symbols or gestures, which s/he deems important and best to use in the composition of the message. It is also the responsibility of the sender to choose the right channel/medium through which to pass the message. The sender is, therefore, the sole determinant of the message and the channel through which it passes to the receiver. Other than being the encoder (the composer of a message), in the communication process, the sender can also be the decoder (the interpreter of the message). This occurs when the sender receives feedback from the receiver which s/he has to interpret and act upon.

The outcome of the encoding process is the message, which can either be spoken language, written language or nonverbal. The message is the content of the communication act. It is the information intended for the receiver. It has to be in the right code, well organized and understandable to the receiver. To get from the sender to the receiver, the message is sent through a medium or channel. The medium is the carrier of the message, that is, the way through which the information is passed. To achieve effectiveness, the medium chosen has to be appropriate for the message and recipients. It can be a face-to-face conversation, a telephone call, an e-mail or a written report.

The receiver is the person for whom the message is meant. The receiver is to receive and comprehend the message. On receiving the message, the receiver decodes it into meaningful information. After interpreting the message, the receiver reacts to it and sends feedback to the sender. At this point in the communication process, the receiver is the encoder as s/he is the one who composes the message to send back to the sender as feedback. Because they interchange positions, the receiver is as important in the communication process as the sender.

Noise, in the communication process, is anything that distorts the message and includes things like: different perceptions and interpretations of the message, language barriers, interruptions, emotions, attitudes etc.

The last element, in the communication process, is feedback. This is the receiver’s response, in form of a message, to the sender’s message. Feedback can be verbal or non-verbal cues perceived in reaction to communication. Feedback allows the sender to determine whether the message has been received and understood, hence it helps monitor whether the communication is effective or not. As mentioned above, at the point of feedback, the receiver becomes the sender and encodes the message, while the sender becomes the receiver and decodes the message.

Besides the elements of the communication process outlined in the preceding discussion, the situation or context in which the communication occurs is also important for effectiveness. The art of communication takes place within a context or situation (Stanton, 2009). In order to communicate effectively, participants in a communication event need to learn to recognize the characteristics of the situation they are to communicate in. There is need for them to identify similarities in situations in order to learn from their experiences and know what to do or what to expect. However, participants need to analyze each situation anew. It is problematic for them to assume a situation as familiar as this may lead to assuming that they know what to say and do, which may not be appropriate to that situation.

The quality of any communication is determined by the elements in the communication process discussed above. A problem in any one of these elements can reduce communication effectiveness (Keyton, 2010, 2011). For effective
communication to be achieved, information must be encoded and decoded into a message that can be understood as the sender intended. An appropriate medium for carrying the message must be selected. Elements of noise that may affect the communication must be put into consideration in the encoding and decoding of the message. There has to be some kind of feedback. When feedback does not occur, the communication process is referred to as one-way communication, which is undesirable (Lunenburg, 2010; Stanton, 2009). Finally, participants should be familiar with the context of the communication in order to help notice and tackle any problems that may ensue during the communication.

III. BARRIERS TO EFFECTIVE COMMUNICATION

Ineffective communication is brought about by the existence of noise in any of the elements of the communication process: the sender, the encoding, the message, the medium, the decoding, the receiver and the feedback. Complete clarity of meaning and understanding does not occur if noise exists in these elements in any way (Lunenburg, 2010; Shaw, 2011). Noise, in any form, constitutes barriers to effective communication. Eisenberg (2010) and Lunenburg (2010) identify four types of barriers: process barriers, physical barriers, semantic barriers and psychosocial barriers.

A. Process Barriers

Barriers related to and resulting from any step in the communication process are referred to as process barriers. They can be sender, encoding, medium, decoding, receiver or feedback related barriers. A sender who can encode an understandable message but cannot utter or write it, a sender who cannot encode a meaningful message at all, or a receiver who cannot decode a message and give it meaning create process barriers. Similarly, a channel or medium that is not appropriate for a given message is a process barrier.

B. Physical Barriers

Physical barriers result from distractions in the physical environment where the communication is taking place. They may include things like: telephone calls, drop-in visitors, distances between people, walls, the radio, television etc. These destructions interfere with communication effectiveness.

C. Semantic Barriers

These have to do with the words used in a communication event, how they are used and the meaning attached to them. The words used may: mean different things to different people; have different meanings in different contexts; be new to the recipients who may not know their meaning or they may not make sense at all to the recipients. This causes communication barriers because if people do not recognize and understand the words, they cannot understand the message.

D. Psychosocial Barriers

Psychosocial barriers are psychological or social in nature. Psychological barriers have to do with mental and emotional factors such as filtering (people often see and hear what they are emotionally tuned to see and hear) and psychological distance (people often resent attitudes that undermine or belittle them, something which separates them from the communicator, blocking opportunities for effectiveness). Social barriers, on the other hand, emanate from social factors such as people's backgrounds, perceptions, values, biases, needs and expectations. Senders and receivers can encode and decode messages only in the context of their fields of experience.

IV. ACQUIRED LANGUAGE DISORDERS

Language is related to thought and the ability to think about the future is dependent on language (Lyons, 1981). Therefore, language supports abstract thought. Acquired language disorders arise when something goes wrong with the brain, of individuals with proper language functions, resulting in language problems (O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001; Ondondo, 2014). There are three main types of acquired language disorders: aphasia, alexia and agraphia (O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001).

A. Aphasia

Aphasia is an impairment of language function caused by damage to the brain. It usually emanates from injury to the brain or through a stroke. Aphasia entails difficulties in producing and/or understanding linguistic forms (Yule, 1985) and involves a mixture of deficits to do with speaking, listening, reading and writing. However, there are some forms which are much more specific in which particular skills are lost and others remain intact. The type and amount of aphasic disturbances that a person exhibits depends on how much the brain is damaged and where it is damaged. There are two main types of specific aphasia discerned from the area of the brain that is damaged (O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001).

1. Broca’s Aphasia

Broca’s aphasia is caused by damage to Broca’s area of the brain, an area that manages production of grammatical utterances. Broca’s aphasia leads to a variety of language problems. First, there is slow, halting and largely reduced amount of speech production. Second, we have great difficulty in accurately producing the phonemes needed in saying
a word. This results in phonemic errors in which the subject substitutes sounds that are difficult to articulate with sounds that are easy to articulate thereby destroying the shape and meaning of the word. Third, long periods of silence are experienced in the production of an utterance due to hesitations. The utterances that result lack normal sentence intonation which contributes a lot to the interpretation and understanding of the utterance. Fourth, a number of words normally found in the utterance are omitted. These words are mostly function words. Omitted also are inflectional markers such as those marking tense, person and number. These omissions distort the utterance making it difficult to comprehend and understand. Lastly, subjects with Broca’s aphasia interpret utterances according to the knowledge of the world and not syntactic structure. In this way they do not interpret correctly and/or understand sentences that are syntactically correct but go contrary to real world knowledge. They also find it hard to construct or distinguish grammatical sentences from ungrammatical ones. Therefore, Broca’s aphasia, also known as non-fluent aphasia, is not simply a production deficit. It also affects syntactic competence. It is therefore a deficit that exhibits difficulties both in producing utterances and understanding and distinguishing the grammaticality and ungrammaticality of utterances.

In very severe cases Broca’s aphasia is characterised by complete failure to speak (Akmajian, Dermers, Farmer, & Harnish, 2010; O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001). Broca’s aphasics understand and make sense of what is spoken to them. People with this disorder are aware of it. Since they know what they are trying to say but cannot get it out, they, in most cases, get very frustrated when trying to speak (Akmajian, Dermers, Farmer, & Harnish, 2010; O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001; Ondondo, 2014).

2. Wernicke’s Aphasia

Wernicke’s aphasia results from damage to Wernicke’s area of the brain. This is the area responsible for construction of meaning. Wernicke’s aphasia is also known as fluent aphasia because subjects with this disorder have no difficulty producing speech. Their speech generally sounds very good, has no long pauses and sentence intonation is normal. There is no simplification of phonemes and no words are omitted. Function words and inflectional markers are used appropriately and word order is usually syntactically correct. However, they have great difficulty selecting, organising and monitoring their speech production. Wernicke’s aphasics have major difficulties producing understandable utterances and understanding what is said to them. Their utterances, though spontaneous, consist of structures that are not related to each other and that are irrelevant to the question or context. Phonemes, words and structures used are selected randomly resulting in speech that has the correct structure and intonation but with very few real words of the language in question, and which are meaningless in most of the cases.

Therefore, Wernicke’s aphasia is primarily a comprehension deficit. Given that comprehension is the pillar for language ability (O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001), when it breaks down the ability for language also does. In this way, subjects with Wernicke’s aphasia cannot express themselves since they cannot understand what they have just said. They also cannot use that understanding to plan what to say next. They cannot have coherent flow of thought because they have lost contact with themselves and the rest of the world. Usually such subjects are unaware of their disorder. As such, Wernicke’s aphasia is the basis for meaningless utterances (O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001; Ondondo, 2014).

Normal language function entails proper language use which is an amalgam of content and form. The two types of aphasia described in the foregoing discussion show abnormal language function. In the case of Broca’s aphasia, form is compromised but content of language remains relatively intact. On the contrary, there is rapid flow of form in Wernicke’s aphasia but there is very little or no content.

B. Acquired Alexia

Acquired alexia is an impairment of reading ability resulting from brain damage. It is acquired in the sense that subjects with this disorder possessed normal reading ability prior to brain damage. Acquired alexia is related to aphasia. Most Broca’s aphasics cannot read aloud and if they do it is very slow, with a lot of difficulty and it is disjointed. However, their silent reading is very good (Kahmi & Catts, 1989; O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001). Wernicke’s aphasics, on the other hand, do not comprehend or make sense of what they read or listen to, though they recognise the letters and the sounds (Akmajian, Dermers, Farmer, & Harnish, 2010; O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001).

C. Acquired Agraphia

This is an impairment of writing ability caused by damage to the brain. It is also related to aphasia. It is acquired because subjects with this disorder had normal writing ability before brain damage. Broca’s aphasics find it difficult to write. They write very little, very slowly and with a lot of difficulty. Whatever they write is normally ungrammatical and with many gaps. They know what they want to write but they are unable to put it down on paper. However, they can understand what is written to them (Kahmi & Catts, 1989; O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001). The writing of Wernicke’s aphasics is very good but incomprehensible. It does not make sense. They also do not comprehend and make sense of what they write or what is written to them (Akmajian, Dermers, Farmer, & Harnish, 2010; O’Grady, Archibalds, Aronoff, & Rees-Miller, 2001)

The acquired disorders discussed in the preceding sections have consequences on language competence. They affect the knowledge that underlie language functioning. The disturbances they cause are intertwined. The deficits seen in speaking and listening are also reflected in writing and reading and vice versa.
V. How Acquired Language Disorders Affect Communication Effectiveness

The three most important acquired language disorders, discussed in the preceding sections, are aphasia, alexia and agraphia. The latter two are related to the former and have to do with the impairment of reading and writing respectively. Their characteristics are linked to and determined by the two different types of aphasia - Broca’s and Wernicke’s aphasia.

A. Broca’s Aphasia

Broca’s aphasics have problems with speaking, writing and reading aloud, as discussed in the foregoing section. However, they understand well what is said to them, what is written down and what they read silently. This implies that Broca’s aphasics cannot encode and produce a message (whether spoken or written) that can be easily understood by the recipient. In this way Broca’s aphasia is a process barrier to effective communication. It entails sender, encoding and message barriers. It is also a semantic barrier because what Broca’s aphasics encode and produce cannot be easily understood; it is ungrammatical. Though Broca’s aphasics can understand the message, there by not posing any barriers as receivers and decoders of the message, they are a feedback barrier (a process barrier as well) given that they cannot encode and produce any understandable feedback to the sender.

B. Wernicke’s Aphasia

Wernicke’s aphasics produce rapid, fluent and grammatical speech. Their writing and reading is good and spontaneous. However, their speech and writing is meaningless (has no semantic content), while their reading comprehension is very poor. This implies that, Wernicke’s aphasics cannot decode or encode meaningful messages whether written or spoken. Therefore, Wernicke’s aphasia is both a process and semantic barrier to effective communication. As a process barrier it entails sender, encoding, message, receiver, decoding and feedback barriers.

VI. Improving Communication Effectiveness

In order to help improve communication effectiveness in communication events involving people with acquired language disorders, participants in a communication event need to have some background information about each other. They need to know if any of the participants has a language disorder and which one it is. As mentioned in section 4.1.1, Broca’s aphasics are aware of their disorder, while Wernicke’s aphasics are not, as stated in section 4.1.2. Being aware of the language disorder that some participants may have will help the participants put mechanisms in place to tackle some of the barriers that may occur in the communication process, thereby improving effectiveness. Participants will endeavour to choose the most effective approach for delivering the message. They will need to use alternative and augmentative communication systems as well as be sensitive to the total setting/context in which they communicate.

Another way of improving communication effectiveness when communicating with people that have acquired language disorders requires individual participants in the communication event to be sensitive to the disorder that the other person has. Participants should then learn to adopt and use approaches that help the person be at ease with the disorder. They should make an effort to help the person feel free to communicate despite the disorder, hence providing a permissive environment for the communication hence effectiveness. Participants should not point out the disorder to others in a demeaning way but should show understanding, patience and acceptance. They should also try to get down to the physical level of the person as per their disorder in order to get and pass on the message intended. Important also is using communication techniques that help the person overcome his/her communication problems.

The third intervention advocates for the use of recommended communication strategies, specific to each language disorder, to assist the person handle the problem. There are manuals with well documented strategies relevant to how to deal with all language disorders. They show strategies on how to help and support people with specific language disorders (Catts, 1991; Health and Welfare Canada, 1982; McCarney, Wunderlich, & Bauer, 1993; Ondondo, 2014; Rosner, 1993; Students Support Services, 2000; Travis, 1971).

VII. Conclusion

Acquired language disorders affect speech, language and literacy which are important and relevant for communication. Any problems with these aspects hinder effective communication as this endangers the different elements of the communication process. Therefore, acquired language disorders affect effective communication. This has psychosocial impacts on the lives of the affected individuals. Loss of effective communication may lead to: social isolation, loss of social role in the family and community, loss of ability to pursue work; loss of income and increased dependency on others. This does not affect the individuals involved alone but also their families and communities. When roles within the family change as well as economic circumstances every person involved is strained in some way. There is, therefore, great need for awareness and understanding of any language disorder present in a communication event by the participants. There is also need for timely help and support for individuals with language disorders in a communication event in order to help alleviate the long term effects of the disorder on effective communication and the family and community as a whole.
VIII. RECOMMENDATIONS FOR FURTHER RESEARCH

The information presented in this paper is based on library research. There is need for empirical research on the same. More research can also be directed at analysing how developmental language disorders and speech disorders affect effective communication.

REFERENCES