Elders' Attitudes and Behavior Regarding ComputerLink* Patricia Flatley Brennan, RN, PhD, FAAN, and Kathleen Smyth, PhD Case Western Reserve University, Cleveland, Ohio

ComputerLink is a set of telecommunications modules designed to provide information, decision making assistance, and communication support to caregivers of persons with Alzheimer's disease. Over 19 months, each of the 47 AD caregivers had 12 consecutive months of access. There were a total of 3875 accesses to the AD caregivers' ComputerLink. Attitudes toward ComputerLink were assessed. Subjective and objective measures of use also were captured. ComputerLink users held generally positive attitudes towards the use of the computer network and tended to under-report the number of times they accessed the system.

INTRODUCTION

ComputerLink is a set of telecommunications modules designed to provide information, decision making assistance, and communication support to caregivers of persons with Alzheimer's disease (AD). Examination of attitudes towards ComputerLink aids in discerning motivation for use. However, use of ComputerLink may vary depending on whether it is measured by subjective or objective means. This paper examines elders' attitudes towards ComputerLink use, and explores differences in subjective and objective appraisals of use.

Instruments and Measures

Attitudes toward ComputerLink were assessed in a self-administered 20-item investigator-developed instrument. Based on other reports of users' reactions to using computers, subjects were prompted with single-word adjectives and asked to indicate in a likert-format the extent to which the adjective expressed how they had felt while using ComputerLink.

A passive monitoring system recorded each individual's use and noted screen sequences. Subjective appraisal of use was assessed by a single-item question that asked subjects' to estimate how often they had used ComputerLink during the previous year.

Attitudes towards ComputerLink

Thirty-five subjects completed the Adjectives Reactions to ComputerLink form. Listed below are the adjectives grouped by whether the adjective term connotes a positive or negative attitude toward ComputerLink, and the percent of persons reporting that use of ComputerLink engendered this attitude *Quite a Bit* or *Extremely*.

Positive	Quite a Bit /Extremely	
Interested	75%	
Excited	29%	
Strong	18%	
Inspired	32%	
Enthusistic	52%	
Proud	33%	
Alert	31%	
Determined	33%	
Attentive	41%	
Active	29%	

Negative	Quite a Bit /Extremely	
Distressed	39%	
Upset	32%	
Guilty	30%	
Hostile	15%	
Irritable	35%	
Ashamed	15%	
Nervous	33%	
Scared	23%	
Jittery	26%	
Afraid	26%	

Most subjects held favorable attitudes towards ComputerLink. ComputerLink engendered attitudes of "Interested" and "Enthusiastic" for over 50% of the respondents. Generally fewer than one-third experienced any negative feelings about ComputerLink; the most commonly expressed negative feelings were "Distressed", "Upset", "Irritable" or "Nervous"; these were identified by fewer than ten respondents each. Cross tabulations of each individual attitude revealed tight scatter around the median for postive-positive and negative-negative comparisons, and broad scatter for positive-negative comparisons.

Subjective and Objective Measures of Use

Number of Subject	Subjective Number of Logons	Objective Mean (sd) Count of Logons	Objective Range of Logon Counts
10	8 or less	19 (14.1)	3-54
13	Monthly	60.6 (55.61)	7-170
16	Weekly	79 (66.26)	9-275
7	Once a Day	147 (80.9)	31-234
1	>Once a Day	590	590

These data demonstrate that most individuals underestimated their use of ComputerLink; individuals who believed they used the ComputerLink daily were the only ones who, on self-report, over-estimated their actual behavior. Most persons thought they had accessed ComputerLink once a week. Weekly logons for a calendar year would result in a count of 52 logons. The discrepancy between 52 and 80 may be explained by a early participation behavior in which individuals accessed ComputerLink frequently during the early weeks of the experiment, and then stabilized to a pattern of access every seven days.

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