Attitudes Toward Mental Health Help Seeking as Predictors of Future Help-Seeking Behavior and Use of Mental Health Treatments

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Objectives: The study examined the association of attitudes toward mental health help seeking and beliefs about the effectiveness of treatments with future help-seeking behavior and use of specific services in the general population.

Methods: Data on attitudes and beliefs at baseline were taken from the U.S. National Comorbidity Survey (NCS), a general population survey conducted in 1990–1992. Help seeking from various providers and use of psychiatric medications and counseling or therapy were examined in the NCS follow-up, in which 5,001 of the original NCS participants were reinterviewed in 2001–2003.

Results: Willingness to seek professional help for a serious emotional problem and feeling comfortable talking about personal problems with professionals were significantly associated with future help seeking and treatment use. One-third (33.4%) of participants who stated at baseline that they would "definitely go" to a professional if they had a serious emotional problem sought future help, compared with 20.7% of those who would "definitely not go." Corresponding values were 33.4% and 24.4% for those who reported feeling "very comfortable" and "not at all comfortable," respectively, talking about personal problems with a professional. The associations were consistent among participants with and without a history of help seeking and with and without mood, anxiety, or substance use disorders during the follow-up. Embarrassment if friends found out and beliefs about treatment effectiveness were not associated with future help seeking or service use.

Conclusions: Identification of attitudinal factors most closely linked to future mental health help seeking has potential implications for public mental health campaigns.

Psychiatric Services 2016; 67:650–657; doi: 10.1176/appi.ps.201500164

Improving public attitudes toward seeking professional help for mental health problems has been a major focus of campaigns aimed at increasing mental health service use (1–7). This emphasis is partly based on the findings of past research that identified significant attitudinal barriers to mental health help seeking (8–12).

There is some evidence, however, that public attitudes toward mental health help seeking and mental health treatments have become more positive in recent years (13,14). Time-trend studies of public attitudes have shown growing endorsement of both psychiatric medication and psychotherapy in Western industrialized countries (15). In the United Kingdom and Australia, changes in public attitudes have corresponded with large-scale public and media campaigns (4,5,16–19). The changes in attitudes have been matched by significant increases in the use of mental health services in recent years (20–25). Although it is plausible to link increased use of mental health services in recent years to changes in attitudes, with rare exceptions (26), there is surprisingly little evidence from prospective studies of a direct link between attitudes toward help seeking from professionals and actual help-seeking behavior (27–29). A study in Australia prospectively examined the association of attitudes with patterns of help seeking in a general population sample (26). However, the follow-up in that study was limited to individuals who were symptomatic at baseline, and more than 97% of participants reported use of services at follow-up.

Psychological studies suggest that the link between expressed attitudes and behavior is often not direct and is moderated by various other factors, including norms and expected consequences of the behavior (6,30–33). Furthermore, changes in social norms and social desirability of an attitude may influence expression of that attitude in surveys. Thus a direct association between attitudes toward help seeking and actual help-seeking behavior cannot be assumed, and this association needs to be empirically assessed. Furthermore, cross-sectional studies of the association of help-seeking attitudes and behaviors may not provide valid inferences about the causal impact of attitudes because

of possible reciprocal impact of behavior on attitudes (34). People's attitudes could simply change after they use services (35). Thus the association needs to be assessed prospectively.

This study addressed the gap in past research by prospectively examining the link between attitudes toward mental health help seeking from professionals and later help-seeking behavior. It used data from the National Comorbidity Survey (NCS) conducted in 1990–1992 and the NCS follow-up (NCS-2), conducted in 2001–2003. More specifically, the study examined the association between attitudes and help seeking from various professionals and the use of various types of treatment. The study also assessed whether these associations varied according to a participant's history of help seeking and presence of psychiatric disorders during the follow-up period. The findings have potential implications for design of future public health campaigns aimed at increasing mental health help seeking from professionals. The findings also have implications for better understanding of the contribution of changes in attitudes to recent trends in use of mental health services (25,36) among individuals with and without mental disorders.

METHODS

Sample

The NCS was a nationally representative survey of 8,098 participants ages 15 to 54 in the noninstitutionalized U.S. civilian population (37). The response rate was 82.4%. Interviews were conducted face to face by trained lay interviewers and administered in two parts. Part I, which included the core diagnostic interview, was administered to all participants. Part II, which included assessments of additional disorders as well as questions regarding attitudes toward help seeking, was administered to a probability subsample of 5,877 participants, including all participants ages 15 to 24, all others with any lifetime *DSM-III-R* disorder assessed in part I, and a random subsample of other part I participants. The part II sample was weighted to adjust for differential probabilities of selection and for discrepancies between the sample and the U.S. population on sociodemographic and geographic variables. The design and weighting of NCS data have been described in more detail elsewhere (37).

The NCS-2 sought to follow up all 5,877 part II NCS participants. Of these, 166 were found to be deceased at follow-up. A total of 5,001 (87.6%) of those surviving were reinterviewed. NCS-2 participants were administered a modified version of the baseline interview assessing the onset and course of disorders between the two surveys.

Baseline Assessments

Attitudes toward mental health help seeking were assessed by three questions: "If you had a serious emotional problem, would you definitely go for professional help, probably go, probably not go, or definitely not go for professional help?" "How comfortable would you feel talking about personal problems with a professional—very comfortable, somewhat, not very, or not at all comfortable?" "How embarrassed would you be if your friends knew you were getting professional help for an emotional problem—very embarrassed, somewhat, not very, or not at all embarrassed?" For this study, the responses were coded so that a higher score indicates more positive attitudes.

Beliefs about effectiveness of professional help and likelihood of recovery without it were assessed by two questions: "Of the people who see a professional for serious emotional problems, what percent do you think are helped?" "Of those who do not get professional help, what percent do you think get better even without it?" For this study, responses to each question were categorized into four mutually exclusive categories: 0%−24%, 25%−49%, 50%−74%, and 75%−100%. In addition, the participant's belief about the benefit of treatment was operationalized as the difference between the two percentages (that is, the response to question 1 minus the response to question 2). This computed difference was categorized into three categories: not beneficial (≤0% difference), very beneficial (≥30% difference), and somewhat beneficial (0%−29% difference). Very and somewhat beneficial were defined on the basis of the median difference among participants whose responses indicated any benefit of treatment (>0% difference).

Lifetime help seeking from professionals was assessed in NCS by asking participants to identify from a list the types of professional that they had ever seen for problems with their "emotions or nerves" or their "use of alcohol or drugs." The list included mental health professionals (psychiatrists, psychologists, social workers, and counselors), general medical professionals (general practitioners, family physicians, other physicians, nurses, occupational therapists, and other health professionals), and other professionals (ministers or priests, spiritualists, herbalists, and others). A history of contact with any of these professionals was recorded as lifetime help seeking from professionals at baseline.

Lifetime psychiatric disorders were assessed by using a modified version of the World Health Organization Composite International Diagnostic Interview, version 1.1 (CIDI), a fully structured, lay-administered diagnostic interview (38) based on *DSM-III-R* criteria. In this study, we focused on anxiety disorders (simple phobia, social phobia, panic disorder with or without agoraphobia, agoraphobia without panic disorder, generalized anxiety disorder, and posttraumatic stress disorder), mood disorders (major depressive disorder, dysthymia, and bipolar disorder), and substance use disorders (alcohol and drug abuse or dependence). Concordance of these diagnoses with clinician diagnoses has been demonstrated in previous studies (39,40).

Severity of mental disorders was assessed consistent with past research (34) by asking about the level of interference and suicidality. Participants were asked how much their symptoms interfered with their lives and activities on a scale ranging from "not at all" to "a lot." The question was

asked following questions about symptoms of each disorder, except for posttraumatic stress disorder and substance use disorders. Participants were also asked whether they ever thought about, planned, or attempted suicide.

Sociodemographic variables included sex, age, race-ethnicity (non-Hispanic white, non-Hispanic black, Hispanic, and other), education, family income compared with the federal poverty level for 1990, and any health insurance, all based on responses in the NCS interview.

Follow-up Assessments

Help seeking from professionals in NCS-2 was assessed similarly to NCS, by using a list of professionals. Contact with any of these professionals was recorded as help seeking from professionals during the follow-up.

Use of specific mental health treatments was assessed by asking participants whether they had used a prescription medicine for "emotions, nerves, or mental health from any type of professional" since the baseline interview or had "one or more sessions of psychological counseling or therapy for emotional problems that lasted 30 minutes or longer with any type of professional." In addition, participants were asked about the number of years since baseline in which they had received either type of treatment.

Psychiatric disorders present during the follow-up were assessed in the NCS-2 by using the CIDI version 3.0 (41), which is based on the *DSM-IV* criteria. The same disorder groups used in the baseline assessment were included in this assessment. Severity of disorders during the follow-up was also assessed by the level of interference and suicidality.

Data Analysis

Data were analyzed in two stages. First, the association of attitudes and beliefs at baseline with actual help seeking from professionals and use of treatments during the follow-up period was examined by using unadjusted and adjusted binary logistic regression models. Negative binomial regression models were used for examining the association of attitudes and beliefs with the number of years of use of each treatment type during the follow-up. Adjusted analyses controlled for the following baseline variables: sex; race-ethnicity; age; education; employment; family income; health insurance; mood, anxiety, or substance use disorders and associated level of interference; suicidal ideation, plans, or suicide attempts; and help seeking from professionals. The analyses also adjusted for psychiatric disorders, interference, and suicidality during the follow-up. These variables have been shown to be associated with seeking help from professionals in past research (26,33,34,42). In both the adjusted and unadjusted analyses, each attitude or belief rating was entered into the model separately, because these ratings were strongly correlated. In the adjusted models, the sociodemographic and clinical variables described above were also entered into the models.

In the second step of the analyses, we assessed whether the associations were consistent or varied according to baseline lifetime help seeking from professionals and follow-up psychiatric disorders. For these analyses, we tested the interaction terms for baseline help seeking and follow-up disorders, on the one hand, with attitude ratings, on the other hand, in the regression models. We further conducted stratified analyses according to psychiatric disorders during follow-up (meeting any disorder criteria versus not meeting criteria for any disorder).

Stata 13 software was used for the analyses. Because of multiple statistical tests used in the analyses, a conservative $p<.01$ cutoff was used for judging the statistical significance of the results. All percentages reported are weighted and do not necessarily correspond to percentages based on raw numbers.

RESULTS

The characteristics of NCS participants who were followed up in NCS-2 have been previously reported (43). A total of 3,333 participants (49.2%) met the criteria for a lifetime mood, anxiety, or substance use disorder at baseline, and 1,969 (30.8%) reported ever having sought professional help for mental health or substance-related problems. A total of 2,784 (48.9%) met the criteria for a disorder during the follow-up. Participants generally had a positive attitude toward mental health help seeking and viewed mental health treatments as beneficial (Table 1).

A total of 1,664 (27.8%) participants reported seeking help from professionals during the follow-up: 1,163 (18.3%) from mental health professionals, 918 (15.2%) from general medical professionals, and 224 (3.0%) from other professionals (some individuals sought help from more than one type of provider). A total of 1,178 (19.4%) reported using prescription medications, and 1,203 (19.7%) reported using psychological counseling or therapy.

Willingness to seek professional help for serious emotional problems and feeling comfortable talking about personal problems with a professional were both associated with help seeking from a professional and use of treatments in the follow-up. For instance, 33.4% of participants who stated at baseline that they would definitely seek professional help sought such help in the follow-up period, compared with 20.7% who stated that they would definitely not seek such help (Table 1). In unadjusted logistic regression analysis, each increase in level on the willingness scale was associated with higher odds of help seeking from any type of professional during follow-up (odds ratio [OR]=1.29, 99% confidence interval [CI]=1.14–1.46, $p<.001$). Associations between the baseline willingness rating and help seeking during follow-up from mental health professionals (OR=1.21, CI=1.05–1.41, p=.001) and general medical professionals (OR=1.33, CI=1.16–1.54, $p<.001$) were both statistically significant. The association between willingness to seek professional help and help seeking from other professionals was of a similar magnitude, but it was not statistically significant at $p<.01$ (OR=1.37, CI=.95–1.97,

TABLE 1. Help seeking from professionals and use of treatments during follow-up among NCS-2 participants (N=5,001), by attitudes and beliefs that they reported as NCS participants[a]

			Mental health help seeking during follow-up											
	Total sample (N=5,001)[b]		Any professional (N=1,664)[b]		Mental health professional (N=1,163)[b]		General medical professional (N=918)[b]		Other professional (N=224)[b]		Prescription psychiatric medication (N=1,178)[b]		Psychological counseling or therapy (N=1,203)[b]	
Baseline attitude or belief	N	Column %[c]	N	Row %[c]	N	Row %[c]	N	Row %[c]	N	Row %[c]	N	Row %[c]	N	Row %[c]
Will go for professional help for serious emotional problem														
Definitely not	202	4.5	45	20.7	31	15.9	22	7.1	4	2.0	30	11.7	32	15.9
Probably not	887	16.4	235	23.1	160	16.4	129	11.6	26	2.1	171	15.2	168	17.4
Probably	2,208	44.8	657	25.9	442	16.3	380	15.0	95	2.6	458	18.0	459	16.6
Definitely	1,701	34.2	727	33.4	530	22.3	387	18.3	99	4.0	519	24.2	544	23.5
Comfortable talking about personal problems with a professional														
Not at all	437	8.7	127	24.4	92	17.6	76	12.7	16	2.8	89	15.9	87	16.7
Not very	928	18.0	238	21.5	146	13.3	136	11.5	26	1.9	168	13.9	155	13.7
Somewhat	2,359	47.2	773	27.8	542	17.9	422	15.6	108	2.8	541	19.5	571	19.5
Very	1,272	26.1	526	33.4	383	23.0	284	18.2	74	4.1	380	24.3	390	22.9
Embarrassed if friends knew about getting professional help														
Very	470	9.8	137	26.5	95	19.0	70	12.2	14	2.2	96	16.6	100	19.0
Somewhat	1,656	33.0	497	24.8	336	15.3	276	14.4	68	2.5	346	17.5	347	16.2
Not very	1,233	24.3	426	30.4	305	20.3	236	17.4	57	3.2	295	21.0	315	21.4
Not at all	1,638	32.9	604	29.2	427	19.8	336	15.4	85	3.5	441	21.0	441	20.3
What percent of people who see a professional are helped?														
0–24	522	10.6	162	27.3	111	19.7	86	13.6	23	3.0	122	19.6	112	20.5
25–49	789	15.8	248	27.4	169	17.7	142	15.8	40	3.5	168	18.4	186	19.6
50–74	2,205	46.2	734	28.5	519	18.8	398	15.4	91	2.7	514	19.9	531	19.0
75–100	1,327	27.4	465	27.6	328	18.2	261	15.3	65	3.3	331	19.1	338	18.9
What percent of people who do not get professional help get better?														
0–24	1,883	43.4	617	26.2	435	18.2	337	13.4	84	2.8	452	18.8	457	19.3
25–49	1,265	28.4	418	26.4	314	19.9	219	12.9	47	2.3	266	15.9	323	20.0
50–74	1,131	24.7	375	31.1	247	18.8	218	18.3	60	3.3	276	23.1	254	19.6
75–100	164	3.5	53	29.9	37	17.0	25	17.8	8	4.6	33	19.5	41	19.0
Difference in percent who get better with professional help versus without														
≤0	1,124	25.2	355	28.5	228	16.9	202	16.6	54	3.0	255	20.1	239	18.4
1–29	1,283	28.4	393	27.0	287	19.8	219	13.6	60	3.0	277	18.7	301	19.9
≥30	1,989	46.4	694	27.6	503	19.3	368	14.4	83	2.7	482	18.8	520	20.0

[a] Participants in the 1990–1992 National Comorbidity Survey (NCS) were reinterviewed for the NCS follow-up (NCS-2) in 2001–2003. Ns are actual, and percentages are weighted.

[b] Numbers of participants in the columns vary because some NCS participants did not answer questions about attitudes and beliefs or because of missing values on help-seeking and treatment variables.

[c] Column percentages describe the distribution of attitude ratings in the NCS, and row percentages describe what proportions of participants at each attitude level sought help or used services in the follow-up.

p=.024), possibly because of the smaller number of participants seeking help from these professionals (Table 1). Willingness to seek professional help at baseline was also associated with use during follow-up of psychiatric medications (OR=1.35, CI=1.18–1.55, p<.001) and psychological counseling or therapy (OR=1.23, CI=1.09–1.39, p<.001) (Table 1).

Feeling comfortable seeking professional help was similarly associated with help seeking and use of treatments during the follow-up, including help seeking from any professionals (OR=1.23, CI=1.08–1.41, p<.001), from mental health professionals (OR=1.22, CI=1.05–1.43, p=.001), and from general medical providers (OR=1.21, CI=1.05–1.40, p=.001) and use of psychiatric medications

TABLE 2. Multivariable analyses of attitudes and beliefs of NCS participants at baseline as predictors of help seeking and use of treatments over the follow-up assessed in NCS-2 (N=5,001)[a]

Baseline attitude or belief	Mental health help seeking during follow-up								Prescription psychiatric medication (N=1,178)[b]		Psychological counseling or therapy (N=1,203)[b]	
	Any professional (N=1,664)[b]		Mental health professional (N=1,163)[b]		General medical professional (N=918)[b]		Other professional (N=224)[b]					
	AOR	99% CI	AOR	99% CI	AOR	99% CI	AOR	99% CI	AOR	99% CI	AOR	99% CI
Will go for professional help for serious emotional problem	1.26	1.07–1.47**	1.19	.98–1.44	1.24	1.05–1.47*	1.26	.83–1.91	1.30	1.10–1.54**	1.18	1.01–1.39*
Comfortable talking about personal problems with a professional	1.22	1.04–1.43*	1.22	1.01–1.47*	1.16	.98–1.37	1.19	.79–1.80	1.25	1.08–1.46**	1.21	.99–1.47
Embarrassed if friends knew about getting professional help	1.03	.89–1.19	1.07	.93–1.23	.95	.83–1.09	1.08	.84–1.38	1.01	.87–1.16	1.05	.89–1.25
What percent of people who see a professional are helped?[c]	.98	.93–1.04	.99	.92–1.06	.97	.91–1.05	.99	.88–1.11	.97	.90–1.04	.98	.91–1.05
What percent of people who do not get professional help get better?[c]	1.04	.97–1.12	1.00	.92–1.08	1.06	.98–1.15	1.03	.89–1.19	1.02	.95–1.10	1.00	.92–1.09
Difference in percent who get better with professional help versus without[c]	.97	.92–1.02	1.00	.95–1.05	.96	.90–1.02	.97	.87–1.08	.97	.91–1.04	.99	.93–1.05

[a] Participants in the 1990–1992 National Comorbidity Survey (NCS) were reinterviewed for the NCS follow-up (NCS-2) in 2001–2003. Adjusted odds ratios (AORs) are based on coefficients from logistic regression models in which each attitude or belief variable was entered into a separate model adjusting for sex; race-ethnicity; baseline age; baseline education; baseline employment; baseline family income; baseline health insurance; baseline mood, anxiety, or substance use disorders and associated level of interference of symptoms; baseline suicidal ideations, plans, or attempts; baseline professional mental health help seeking; and psychiatric disorders, interference, and suicidality during follow-up.

[b] Numbers of participants included in regression models vary somewhat because some NCS participants did not answer questions about attitudes and beliefs or because of missing values on help-seeking and treatment variables.

[c] AORs represent change in outcome for every 10% increment in independent variables.

*p<.01, **p<.001

(OR=1.28, CI=1.12–1.46, p<.001) and psychological counseling or therapy (OR=1.23, CI=1.04–1.45, p=.002).

Feeling embarrassed if others found out about help seeking and estimated benefits of help seeking were not significantly associated with help seeking or use of treatments in the follow-up.

Results of the multivariable logistic regression analyses in which each attitude rating was entered separately (Table 2) and that adjusted for sociodemographic and clinical variables were mainly consistent with the results of unadjusted analyses. Willingness to seek professional help was associated with help seeking from any professional and from general medical professionals, as well as with use of both types of treatment. Similarly, feeling comfortable talking about personal problems was associated with help seeking from any professional and from mental health professionals, as well as with use of prescription medications (Table 2). Associations of other attitude ratings with future help seeking and use of treatments remained nonsignificant in adjusted analyses.

The associations were consistent among participants with and without a history of help seeking from professionals at baseline and with and without a first-onset mental disorder during the follow-up, as indicated by the nonsignificant interaction terms of these variables with attitude variables in models predicting each outcome (data not shown). Although some of the significant findings in the main analyses were no longer statistically significant in the stratified analyses because of smaller sample sizes, the direction of associations was consistent with the main analyses. [Tables presenting the results of stratified analyses based on the presence of psychiatric disorders are included in an online data supplement to this article.]

In further analyses, attitudes and perceived benefits of professional help were not associated with the number of years during the follow-up in which the participants had used psychiatric medications or counseling or psychotherapy (data not shown).

DISCUSSION

This study had three main findings. First, willingness to seek professional help and feeling comfortable talking to

a professional about personal problems were positively associated with future help seeking from professionals and use of mental health services. This finding extends the results of previous cross-sectional studies that found associations between individual attitudes and past help seeking or help-seeking intentions (6,34,44). Willingness to seek help for emotional problems may influence intentions to actually seek professional help when the person perceives a need for such help, irrespective of past help-seeking behavior (44). The findings thus lend support to the results of cross-sectional studies that used more elaborate theoretical models describing the formation of help-seeking intentions but that could only speculate about whether these intentions would in fact translate into future help seeking (44).

Second, the association of attitudes with help seeking and use of services appeared to be consistent across subgroups with and without a history of seeking professional help at baseline and with and without mood, anxiety, or substance use disorders during the follow-up. Thus the effects of attitudes toward mental health help seeking appeared to be similar across groups characterized by different levels of need and history of help seeking. Consistent with this finding, comparisons of service use in the early 1990s and early 2000s found a similar increase in use among those with and without mental health problems (21). It is also noteworthy that attitudes remained significantly associated with future help seeking even after the analysis adjusted for past mental health help seeking.

Third, we found no significant associations between feeling embarrassed if others found out about the one's help seeking and future help-seeking behavior. Past research has produced mixed results regarding the association of fear of negative attitudes of family and friends with mental health help-seeking intentions (6,27,45–47). Surprisingly, we also found no association between perceived benefits of professional help seeking and future help seeking. Informing the public regarding the benefits of treatments is a major focus of many public mental health campaigns (16–18). However, the findings from this study suggest that cognitive factors, such as estimates of the benefits of treatment, may be less important than emotional acceptance of help seeking in predicting future help-seeking behavior. Better understanding of factors that influence emotional acceptance of mental health help seeking may help to enhance future efforts aimed at increasing help-seeking behavior. Current efforts may also benefit from using motivating messages aimed at reducing the fear and anticipated discomfort that may act as barriers to mental health help seeking from professionals.

The study had a number of limitations. First, NCS did not specifically assess attitudes toward psychotherapy or medications. Associations between attitudes and service use may vary according to the type of service (6,26,48). Second, the intensity of service use was not assessed. Positive attitudes toward help seeking may be associated with the volume or frequency of service use as well as with any use. Third, the study examined the association of existing variations in attitudes with future help seeking. Variation in attitudes as a result of public campaigns or other interventions may have a different pattern of associations with help-seeking behavior. Fourth, the study examined the association between attitudes at baseline and any help seeking over an 11-year period. Individual attitudes might have changed over this long period, thus attenuating associations with help-seeking behavior. Fifth, the surveys did not assess whether the participants considered themselves as having a mental health problem in need of professional help. This perception may influence both attitudes and help seeking or moderate their relationships (49). Sixth, NCS and NCS-2 were conducted in the early 1990s and early 2000s, respectively. Attitudes toward help seeking and the association of attitudes with help-seeking behavior may be different in more recent times. Finally, all assessments were based on self-report and hence were open to recall and social desirability biases.

CONCLUSIONS

In the context of these limitations, the findings present some insights into the association of attitudes toward seeking mental health help from professionals and subsequent help-seeking behavior in the community. The increasingly positive attitudes toward mental health help seeking from professionals, especially in the younger generation, has likely contributed to increased use of services over the past decade and will continue to do so in the coming years (13,25). Future research on correlates of this attitude change could provide important insights into trends in mental health service use and the factors driving these trends.

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The authors thank Anthony Jorm, Ph.D., D.Sc., for his comments on an earlier version of this article.

Dr. Mojtabai reports receipt of consulting fees from Lundbeck Pharmaceuticals and royalties from UptoDate. Dr. Evans-Lacko reports receipt of consulting fees from Lundbeck Pharmaceuticals. The other authors report no financial relationships with commercial interests.

Received April 26, 2015; revision received September 20, 2015; accepted October 26, 2015; published online February 16, 2016.

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