

Public Conceptions of Mental Illness: Labels, Causes, Dangerousness, and Social Distance

ABSTRACT

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Objectives. The authors used nationwide survey data to characterize current public conceptions related to recognition of mental illness and perceived causes, dangerousness, and desired social distance.

Methods. Data were derived from a vignette experiment included in the 1996 General Social Survey. Respondents ($n = 1444$) were randomly assigned to 1 of 5 vignette conditions. Four vignettes described psychiatric disorders meeting diagnostic criteria, and the fifth depicted a "troubled person" with sub-clinical problems and worries.

Results. Results indicate that the majority of the public identifies schizophrenia (88%) and major depression (69%) as mental illnesses and that most report multicausal explanations combining stressful circumstances with biologic and genetic factors. Results also show, however, that smaller proportions associate alcohol (49%) or drug (44%) abuse with mental illness and that symptoms of mental illness remain strongly connected with public fears about potential violence and with a desire for limited social interaction.

Conclusions. While there is reason for optimism in the public's recognition of mental illness and causal attributions, a strong stereotype of dangerousness and desire for social distance persist. These latter conceptions are likely to negatively affect people with mental illness. (*Am J Public Health*. 1999;89:1328-1333)

Several classic studies in social psychiatry have illuminated the important role that cultural beliefs play in shaping societal responses to people with mental illnesses. Hollingshead and Redlich¹ introduced the concept of "lay appraisal" to indicate that, long before mental health professionals may become involved, people such as family, friends, coworkers, police, and, of course, the person himself or herself appraise the early signs of mental disorders and make decisions about what (if anything) should be done. Others have provided vivid evidence regarding cultural stereotypes. In Nunnally's^{2(p51)} semantic differential study, for example, respondents typified a mentally ill man as "dangerous, dirty, unpredictable, and worthless."

Still others have provided historical examples that underscore the importance of cultural belief systems in influencing large-scale changes in the institutional management of people with mental illnesses. For example, Rothman³ linked the emergence of "asylums" in 19th-century America to cultural beliefs about the importance of rapid urbanization and massive immigration as causes of mental illness. In accordance with these beliefs, asylums were designed to remove people with mental illnesses from the flux and disorder of urban life and to provide them with orderly regimens that could bring equilibrium to their disordered minds.

Thus, the history of social psychiatry teaches us that cultural conceptions of mental illness have dramatic consequences for help seeking, stereotyping, and the kinds of treatment structures we create for people with mental illnesses. The role of cultural conceptions in shaping these processes is still evident. Large proportions of people with mental disorders remain untreated,^{4,5} and pathways into treatment are subject to a host of contingencies suggesting that "lay appraisal" processes are still salient.^{6,7} Rather than waning, recent research suggests that stereotypes

of dangerousness are actually on the increase⁸ and that the stigma of mental illness remains a powerfully detrimental feature of the lives of people with such conditions.⁹⁻¹³ And in the current era of deinstitutionalization, the treatment system has been dramatically altered by "not in my backyard" community responses that have shaped the nature and quality of community residences for people with mental illnesses.¹⁴

Because of the many ramifications of cultural conceptions, a vital role for public health practitioners is to monitor public beliefs. But systematic knowledge about these factors is not easy to come by, particularly in a form that can be replicated in different places and at different times. Fortunately, one of the pioneers of social psychiatry and survey research, Shirley Star, set forth a method that, while not perfect, facilitates an assessment of the nature of public beliefs about mental illness.¹⁵ In a pathbreaking study, Star administered brief vignettes depicting paranoid schizophrenia, simple schizophrenia, alcoholism, anxiety neurosis, juvenile character disorder, and compulsive phobia to a probability sample of more than 3000 Americans. One of Star's remarkable findings was that very few Americans identified the described conditions as mental illness. Only the vignette depicting paranoid

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schizophrenia was so identified by a majority (75%). Simple schizophrenia was identified as mental illness by only 34%; alcoholism, by 29%; anxiety neurosis, by 18%; "disturbed child," by 14%; and compulsive phobia, by 7%.¹⁵

After Star's groundbreaking work, a series of local studies in different parts of the United States and Canada used her vignettes to document a substantial increase in the proclivity of Americans to identify these descriptions as mental illness.¹⁶ Investigators also adopted her vignettes to study such issues as whether seeking psychiatric treatment leads to increased rejection^{17,18} and the extent to which public rejection is driven by the severity of the conditions described.¹⁹

However, psychiatric conceptions of mental illness have changed dramatically since the 1950s, and consequently the original Star vignettes are no longer appropriate for assessing public conceptions. We therefore created a new set of vignettes based on criteria of the *Diagnostic and Statistical Manual of Mental Disorders, Fourth Edition (DSM-IV)*²⁰ and included them in the 1996 General Social Survey. In the present study, we use these vignettes to assess (1) recognition of mental illnesses, (2) beliefs about the causes of mental illnesses, (3) beliefs about how dangerous people with mental illnesses are, and (4) the amount of social distance desired from people with mental illnesses.

Methods

Sample

Data were derived from the MacArthur Mental Health Module (n = 1444) of the 1996 General Social Survey. The General Social Survey is administered biannually to a nationwide, representative sample of adults living in noninstitutional settings in the United States. Details of the sample design and response rate are included in a companion article.²¹

Vignettes

We constructed vignettes to depict people with schizophrenia, major depressive disorder, alcohol dependence, and drug (cocaine) dependence and a "troubled person" with sub-clinical problems and worries. The "troubled person" condition allows us to ascertain the extent to which the public discriminates between clinical conditions and milder forms of "normal" troubles. Also, as a depiction of an "average person" who sometimes has problems in life, it provides a baseline for interpreting results about perceptions of dangerousness and social distance associated

with *DSM-IV* disorders. Vignettes were constructed so that they met *DSM-IV* criteria for the disorder in question. However, because we wanted to know whether the public would identify and recommend treatment for disorders before they proceeded to a chronic or extremely severe course, we did not describe the disorders as being chronic except as necessary to fit diagnostic criteria.

We randomly varied the sex, educational level (eighth grade, high school, college), and ethnicity (White, African American, Hispanic) of the person described in the vignettes. We assigned a name to each vignette subject (John for African American and White men, Juan for Hispanic men, Mary for African American and White women, and Maria for Hispanic women). In this article, however, we focus on variations by type of disorder, and we do not present analyses by vignette gender, education, or ethnicity. Because of the balanced design of the vignette experiment, these factors were equally distributed within and therefore uncorrelated with type of disorder. Consequently, no bias was introduced by omitting controls for these characteristics. Moreover, results (not shown) indicated very little effect of vignette demographic characteristics on the variables analyzed here. Each respondent was randomly assigned to one of the following vignettes.

Alcohol dependence: John is a [ETHNICITY] man with an [EDUCATIONAL LEVEL] education. During the last month John has started to drink more than his usual amount of alcohol. In fact, he has noticed that he needs to drink twice as much as he used to to get the same effect. Several times, he has tried to cut down, or stop drinking, but he can't. Each time he has tried to cut down, he became very agitated, sweaty and he couldn't sleep, so he took another drink. His family has complained that he is often hungover, and has become unreliable—making plans one day, and canceling them the next.

Major depression: John is a [ETHNICITY] man with an [EDUCATIONAL LEVEL] education. For the past two weeks John has been feeling really down. He wakes up in the morning with a flat heavy feeling that sticks with him all day long. He isn't enjoying things the way he normally would. In fact nothing gives him pleasure. Even when good things happen, they don't seem to make John happy. He pushes on through his days, but it is really hard. The smallest tasks are difficult to accomplish. He finds it hard to concentrate on anything. He feels out of energy and out of steam. And even though John feels tired, when night comes he can't go to sleep. John feels pretty worthless and very discouraged. John's family has noticed that he hasn't been himself for about the last month and that he has pulled away from them. John just doesn't feel like talking.

Schizophrenia: John is a [ETHNICITY] man with an [EDUCATIONAL LEVEL]

education. Up until a year ago, life was pretty okay for John. But then, things started to change. He thought that people around him were making disapproving comments and talking behind his back. John was convinced that people were spying on him and that they could hear what he was thinking. John lost his drive to participate in his usual work and family activities and retreated to his home, eventually spending most of his day in his room. John was hearing voices even though no one else was around. These voices told him what to do and what to think. He has been living this way for six months.

Drug dependence: John is a [ETHNICITY] man with an [EDUCATIONAL LEVEL] education. A year ago John sniffed cocaine for the first time with friends at a party. During the last few months he has been snorting it in binges that last several days at a time. He has lost weight and often experiences chills when bingeing. John has spent his savings to buy cocaine. When John's friends try to talk about the changes they see, he becomes angry and storms out. Friends and family have also noticed missing possessions and suspect John has stolen them. He has tried to stop snorting cocaine, but he can't. Each time he tries to stop he feels very tired and depressed and is unable to sleep. He lost his job a month ago after not showing up for work.

Troubled person: John is a [ETHNICITY] man with an [EDUCATIONAL LEVEL] education. Up until a year ago, life was pretty okay for John. While nothing much was going wrong in John's life he sometimes feels worried, a little sad, or has trouble sleeping at night. John feels that at times things bother him more than they bother other people and that when things go wrong, he sometimes gets nervous or annoyed. Otherwise John is getting along pretty well. He enjoys being with other people and although John sometimes argues with his family, John has been getting along pretty well with his family.

Each subject was handed a card with the vignette printed on it and was also read the vignette by the interviewer. Then respondents were queried about potential causes of the situation, labels for the problem, perceived violence risk, and willingness to interact with the described person (see Results section for precise wording). For ease of presentation, we dichotomized response categories, combining "very likely" and "somewhat likely" in one category and "somewhat unlikely" and "very unlikely" in another. In no instance did this dichotomization affect the direction or significance of an effect interpreted here.

Results

Public Recognition of Vignettes as Representing Mental Illness

To assess public recognition, we asked how likely it was that the described person

was experiencing "a mental illness." As shown in Table 1, the vignette most likely to be designated as representing mental illness was schizophrenia (88%), followed by major depressive disorder (69%), alcohol dependence (49%), cocaine dependence (44%), and, finally, the troubled person (22%) ($\chi^2 = 286.2$, $df = 4$, $P < .001$).

These results indicate that respondents in the current study were more likely than Star's respondents to identify *DSM* disorders as mental illness. Nevertheless, they also indicate a continuing discrepancy between psychiatric and public definitions of mental illness. This discrepancy, however, may be due to a reluctance to apply the general term "mental illness" to specific conditions. Because of this possibility, after asking whether the vignette subject was experiencing a mental illness, we provided respondents with the specific label for the condition he or she received. Thus, for the schizophrenia vignette, we asked, "How likely do you think it is that [NAME] is experiencing schizophrenia?" For the other *DSM-IV* vignettes, we inserted "major depression," "alcohol dependence," or "a drug problem" as appropriate. For the troubled person vignette, we omitted this question.

When queried in this way, the vast majority of respondents identified the person described in the vignettes as very or somewhat likely to have the specified condition (98% for alcohol dependence, 97% for cocaine dependence, 95% for major depressive disorder, and 85% for schizophrenia). Thus, while some respondents did not apply the term "mental illness" to the condition described in the vignette, almost all accepted a specific *DSM-IV* label as a descriptor.

TABLE 1—Percentage of Americans Identifying Vignettes as Representing Mental Illness: General Social Survey, 1996

Vignette	No. of Cases	Very or Somewhat Likely to be a Mental Illness, %
Alcohol dependence ^a	257	48.7
Major depressive disorder ^b	278	69.1
Schizophrenia ^c	287	88.1
Cocaine dependence ^d	274	43.5
Troubled person ^e	260	21.5

^aAlcohol tolerance, withdrawal symptoms, inability to cut down or control use, change in functioning.

^bDepressed mood, loss of interest and pleasure, insomnia, fatigue, feelings of worthlessness, inability to concentrate, social withdrawal.

^cDelusions, auditory hallucinations, social and occupational impairment.

^dWithdrawal symptoms, inability to stop cocaine use, occupational impairment.

^eSubclinical mild worrying, sadness, nervousness, sleep problems with no functional impairment.

Public Perceptions of Causes

We asked participants about 6 possible causes of the conditions described: the person's own bad character, a chemical imbalance in the brain, the way the person was raised, stressful circumstances in the person's life, a genetic or inherited problem, and "God's will." Specifically, respondents were asked, "In your opinion, how likely is it that [NAME's] situation might be caused by [CAUSE]?"

As shown in Table 2, stressful circumstances were the most commonly endorsed cause of each condition. Moreover, for every condition except cocaine dependence, more than 90% of the respondents believed that stress was very or somewhat likely to be a cause. The American public has become convinced of the importance of stressful circumstances in bringing about mental disorders of

very different types. Beyond the common thread of stress, however, the public makes clear distinctions between the disorders in terms of their causes. For schizophrenia and major depression, the second most commonly endorsed cause was a chemical imbalance in the brain; for alcohol dependence, it was the way the person was raised; and for cocaine dependence, it was the person's own bad character.

Public Perceptions of Dangerousness

A central aspect of the stereotype of mental illness is dangerousness.^{2,8,22-25} To determine whether the persons depicted in the vignette cases were perceived to be dangerous, we asked, "In your opinion, how likely is it that [NAME] would do something violent toward other people—very likely (4), somewhat likely (3), somewhat

TABLE 2—Perceived Causes of Vignette Conditions: General Social Survey, 1996

Perceived Cause	Vignette, % (No. of Cases)					χ^2 ($df = 4$) ^f
	Alcohol Dependence ^a	Major Depressive Disorder ^b	Schizophrenia ^c	Cocaine Dependence ^d	Troubled Person ^e	
Own bad character	51.3 (267)	38.2 (285)	32.8 (286)	66.1 (286)	39.9 (256)	80.0
Chemical imbalance in the brain	62.8 (253)	72.8 (279)	84.6 (273)	48.2 (274)	42.8 (250)	135.0
Way person was raised	65.9 (261)	47.6 (288)	45.1 (279)	41.7 (281)	58.0 (257)	43.2
Stressful circumstances in the person's life	91.9 (272)	94.8 (290)	90.7 (281)	72.0 (282)	93.5 (263)	98.4
Genetic or inherited problem	60.2 (261)	52.9 (285)	67.0 (270)	27.3 (282)	38.1 (252)	115.1
God's will	9.0 (268)	15.4 (279)	17.4 (281)	5.6 (284)	27.6 (250)	60.4

Note. Percentages represent "very likely" and "somewhat likely" responses.

^aAlcohol tolerance, withdrawal symptoms, inability to cut down or control use, change in functioning.

^bDepressed mood, loss of interest and pleasure, insomnia, fatigue, feelings of worthlessness, inability to concentrate, social withdrawal.

^cDelusions, auditory hallucinations, social and occupational impairment.

^dWithdrawal symptoms, inability to stop cocaine use, occupational impairment.

^eSubclinical mild worrying, sadness, nervousness, sleep problems with no functional impairment.

^f $P < .001$.

TABLE 3—Vignette Condition and Perceived Likelihood of Violence: Means, Standard Deviations, and Percentage Responses: General Social Survey, 1996

Vignette	Perceived Likelihood of Violence		
	Mean (No.)	SD	Indicating Very or Somewhat Likely, %
Alcohol dependence ^a	2.83 (251)	0.77	71
Major depressive disorder ^b	2.25 (282)	0.85	33
Schizophrenia ^c	2.65 (266)	0.81	61
Cocaine dependence ^d	3.27 (276)	0.74	87
Troubled person ^e	1.84 (257)	0.80	17

Note. Analysis of variance results were as follows: (1) vignette, sum of squares=320.51, $df=4$, mean square=80.13, $F=126.35$, $P<.001$, and (2) residual, sum of squares=841.57, $df=1327$, mean square=0.63.

^aAlcohol tolerance, withdrawal symptoms, inability to cut down or control use, change in functioning.

^bDepressed mood, loss of interest and pleasure, insomnia, fatigue, feelings of worthlessness, inability to concentrate, social withdrawal.

^cDelusions, auditory hallucinations, social and occupational impairment.

^dWithdrawal symptoms, inability to stop cocaine use, occupational impairment.

^eSubclinical mild worrying, sadness, nervousness, sleep problems with no functional impairment.

unlikely (2), or very unlikely (1)?” As shown in Table 3, the person depicted with a cocaine dependence problem was perceived as the most likely to be violent, followed in order by persons depicted in the vignettes for alcohol dependence, schizophrenia, major depression, and troubled person. The vignette conditions were significantly and strongly associated with beliefs about violence, explaining 27.6% of the variance in those beliefs. In fact, with a single exception (schizophrenia vs alcohol dependence), each vignette condition differed significantly from every other condition in terms of perceived dangerousness when the Scheffé test was used to control type I error. With the troubled person as a baseline standard (17%), it can be seen that all of the mental disorders, from major depression (33%) to cocaine dependence (87%), were believed to increase substantially the risk of violence.

Attitudinal Social Distance

Social distance questions asked how willing respondents would be to (1 = definitely, 4 = definitely not) (1) move next door to the person depicted in the vignette, (2) spend an evening socializing with the person, (3) make friends with the person, (4) start working closely with the person, and (5) have the person marry into the family. Responses were summed and divided by 5 so that scores could range from 1 (low social distance) to 4 (high social distance). As Table 4 shows, respondents desired the most social distance from the person described as having cocaine dependence, followed in order by the alcohol dependence, schizophrenia, major depres-

sion, and troubled person vignettes. The vignettes explained 22.3% of the variance in attitudinal social distance, and each condition was significantly different from each of the others according to a Scheffé test.

Table 4 also shows the proportion of respondents who scored above the 2.5 midpoint of the scale, indicating that, on average, they were unwilling to engage in the forms of interaction included in the social distance scale. Twenty-nine percent were unwilling to interact with the troubled person, whereas almost all (90%) were unwilling to interact with the person described as dependent on cocaine. Even major depression (47%) incurred a distinct increment in rejection over that experienced by the troubled person.

Because the hierarchies of responses were so similar and because previous research indicates that perceptions of dangerousness are important determinants of attitudinal social distance,²² we calculated the correlation between perceptions of violence and social distance and found it to be 0.432 ($P<.001$). Thus, there was an appreciable association between the belief that a person is likely to be violent and the desire to maintain social distance from that person.

Discussion

We began by pointing to a long tradition in social psychiatry that illuminates the important consequences that cultural conceptions of mental illness have for help seeking, for stereotyping, and for the kinds of treatment structures we create and sustain for peo-

ple with mental illnesses. Because of the potential ramifications of such cultural conceptions, we set out to characterize public beliefs in 4 areas: (1) recognition of mental illnesses, (2) beliefs about the causes of mental illnesses, (3) beliefs about the dangerousness of people with mental illnesses, and (4) the amount of social distance desired from people with mental illnesses.

Results from the first nationally representative study of these issues conducted in 1950 led Star to characterize the public image of mental illness as follows:

Mental illness is a very threatening, fearful thing and not an idea to be entertained lightly about anyone. Emotionally, it represents to people a loss of what they consider to be the distinctively human qualities of rationality and free will, and there is kind of a horror in dehumanization. As both our data and other studies make clear, mental illness is something that people want to keep as far from themselves as possible.^{15(p6)}

On the basis of this characterization, Star was struck by the enormity of the task facing mental health educators. In her view, change would require “a veritable revolution in people’s ideas about some very fundamental questions.”^{15(p9)} Although methodologic differences prevent us from directly comparing our results with those of Star, her observations help frame our consideration and evaluation of the present findings.

Public Recognition

Part of Star’s pessimistic view derived from the observation that few Americans recognized as mental illnesses the conditions in the vignettes she constructed to depict such illnesses. Like Star, we continue to observe some disinclination to “label” vignettes as depicting mental illness. For example, 3 in 10 people thought the major depressive disorder vignette was somewhat or very unlikely to represent a mental illness. Only the schizophrenia vignette was identified as depicting mental illness by nearly 9 in 10 people. But this failure to apply the label of mental illness might occur because respondents are reluctant to apply a stigmatizing label to a disorder such as major depression or simply because the specific phrase “mental illness” does not seem to describe disorders such as alcohol and cocaine dependence.

In light of these considerations, we found it instructive that people would accept a more specific psychiatric label to describe the vignette (i.e., schizophrenia, major depression, alcohol dependence, and drug problem). The more specific labels are consistent with conceptualizations of mental health providers and with appropriate treat-

TABLE 4—Vignette Condition and Social Distance: Means, Standard Deviations, and Percentage Responses: General Social Survey, 1996

Vignette	Desire for Social Distance		
	Mean (No.)	SD	Indicating Very or Somewhat Likely, % ^a
Alcohol dependence ^b	2.85 (267)	0.56	70
Major depressive disorder ^c	2.54 (283)	0.54	47
Schizophrenia ^d	2.75 (275)	0.59	63
Cocaine dependence ^e	3.20 (284)	0.57	90
Troubled person ^f	2.29 (188)	0.44	29

Note. Analysis of variance results were as follows: (1) vignette, sum of squares = 109.08, $df=4$, mean square = 27.27, $F=90.69$, $P<.001$, and (2) residual, sum of squares = 378.85, $df = 1327$, mean square = 0.30.

^aProportion of respondents who scored above the 2.5 midpoint of the social distance scale.

^bAlcohol tolerance, withdrawal symptoms, inability to cut down or control use, change in functioning.

^cDepressed mood, loss of interest and pleasure, insomnia, fatigue, feelings of worthlessness, inability to concentrate, social withdrawal.

^dDelusions, auditory hallucinations, social and occupational impairment.

^eWithdrawal symptoms, inability to stop cocaine use, occupational impairment.

^fSubclinical mild worrying, sadness, nervousness, sleep problems with no functional impairment.

ment seeking. These results suggest that there is less of a gulf between lay and professional conceptions of mental health problems today than Star described at the time of her study.

Perceived Causes

Psychoanalytic understandings that dominated psychiatry following World War II placed great emphasis on relationships with fathers and mothers and fostered the idea that many serious mental disorders (e.g., schizophrenia and depression) were caused by problematic relationships between parents and children.²⁶ Our study shows that in 1996, many members of the public continued to endorse the idea that the way a person is raised is an important determinant of these disorders (45% for schizophrenia and 48% for major depression). It is interesting to note, however, that the way a person is raised is currently perceived to be less important in these disorders than are stressful circumstances and biologic and genetic factors.

There is near unanimity among the US public in identifying stressful circumstances as causes of the vignette conditions. In this regard, it is interesting to note that many respondents blended the emphasis on stressful circumstances with the view that chemical imbalances in the brain and genetic factors are also important causes. Thus, there was a fairly widespread endorsement of a multifaceted explanation for mental illnesses that is not unlike the diathesis–stress perspective adopted by many mental health experts. Again, unlike Star's pessimistic characterization of the US public in 1950, our

results suggest a more refined, multicausal view that is consistent with the views of mental health professionals.

Perceptions of Dangerousness

When it comes to the idea that mental illness is a "fearful thing," however, our results suggest a characterization of the public view that is much like Star's. When the symptoms of mental illnesses are presented in vignettes, people's fears are dramatically heightened. This occurs even though there is no mention of violent behavior in the vignettes. Furthermore, both the absolute magnitude of the percentages of people believing that violence is somewhat or very likely (depression, 33%; schizophrenia, 61%; alcohol dependence, 71%; and cocaine dependence, 87%) and the degree to which these percentages were elevated above those for the troubled person (17%) lead us to the conclusion that public fears are out of proportion with reality. While empirical studies show a modest elevation in violence among people with mental illnesses,²⁷ the difference is never so dramatic as the differences in public response to the troubled person and the other vignettes. Moreover, empirical studies of violence uniformly show that only a minority of people with mental illnesses are violent.

Our findings on perceptions of dangerousness cohere with those of Phelan and colleagues,⁸ who were able to achieve a direct comparison with Star's results by replicating one of her open-ended questions. Phelan et al. found that the public stereotype

of dangerousness, rather than improving, actually increased between 1950 and 1996. Thus, the dangerousness stereotype has endured and probably increased over the past 50 years, even though there have been large-scale public education efforts focused on the nature, causes, and treatment of mental illnesses. If the dangerousness stereotype is to be addressed, we need to confront it directly. We need to understand much more about its origins, we need to learn more about how to communicate the nature of any "real" association between mental illness and violence, and we need to identify interventions that can bring the perceived risk in line with any real risk that may exist.^{24,25}

Attitudinal Social Distance

Consistent with Star's observation that mental illness is something that "people want to keep as far from themselves as possible," we found a strong desire for social distance across several domains of social interaction. One possible reason for this is that the symptoms themselves represent undesirable personal attributes that people want to avoid. But our results concerning the unrealistically elevated fear of violence associated with the vignettes lead us to question this idea as a full explanation. It is not just that the symptoms are undesirable but that they induce fear (i.e., fear that the person will do something violent). And, as our results also show, there is an appreciable correlation between this fear and willingness to interact. This suggests that at least some part of people's reluctance to engage in interaction is an exaggerated fear that symptoms lead to violence. The ideas of "danger" and "fear" that Star emphasized nearly 50 years ago are still with us and play a large role in public perceptions of people with mental illnesses.

Conclusion

We find some reasons for optimism when we compare our 1996 characterization of public beliefs about mental illness with Star's 1950 characterization in terms of the public's identification of mental illnesses and in terms of reasoning about the causes of such illnesses. At the same time, we find a strong connection between mental disorders and perceived likelihood of violence. This, coupled with the fact that such a perception is strongly associated with attitudinal social distance, makes us pessimistic regarding the current status of public beliefs about mental illnesses. If the symptoms of mental illnesses continue to be linked to fears of violence, people with mental illnesses will be nega-

tively affected through rejection, through a reluctance to seek professional help for fear of stigmatization, and through fear-based exclusion by processes such as the "not in my backyard" response. Perhaps we have begun the "veritable revolution" in people's ideas that Star believed was necessary, but we are far from completing it. □

Contributors

Each of the authors was involved in the development of the questions used in the interview that produced the data for the paper. M. Bresnahan was the principal author of 3 of the vignettes; B. G. Link and B. A. Pescosolido each authored one. All authors participated in discussions that led to an outline of the paper. All data analyses were undertaken by B. G. Link. A first draft was prepared by B. G. Link; this draft was extensively revised and edited by J. C. Phelan. The resulting draft was distributed to M. Bresnahan, A. Stueve, and B. A. Pescosolido, and their comments and rewrites and supplementary material were used to prepare a final draft.

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