Psychosocial Mechanisms Underlying Older Black Men’s Health

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Abstract

Objectives: To evaluate the psychosocial mechanisms underlying older Black men’s self-rated health, we examined: (a) the individual, cumulative, and collective effects of stressors on health; (b) the direct effects of psychosocial resources on health; and (c) the stress-moderating effects of psychosocial resources.

Method: This study is based on a nationally representative sample of Black men aged 51–81 (N = 593) in the Health and Retirement Study (HRS). Ordinary least squares (OLS) regression models of the psychosocial determinants of self-rated health draw on data from the HRS 2010 and 2012 Core datasets and Psychosocial Modules.

Results: Each of the six measures of stressors as well as a cumulative measure of stressors are predictive of worse self-rated health. However, when considered collectively, only two stressors (chronic strains and traumatic events) have statistically significant effects. Furthermore, two of the five psychosocial resources examined (mastery and optimism) have statistically significant protective effects, and prayer moderates the harmful effects of traumatic events on self-rated health.

Discussion: Conventional measures of stressors and coping resources—originally developed to account for variance in health outcomes among predominantly white samples—may not capture psychosocial factors most salient for older Black men’s health. Future research should incorporate psychosocial measures that reflect their unique experiences.

Keywords: Black men—Coping—Discrimination—Intersectionality—Self-rated health—Stress

Despite overall improvements in health and life expectancy over the last several decades, Black men continue to have some of the worst health profiles and shortest life expectancies of all race–gender groups in the United States (Gilbert et al., 2016). Importantly, the mechanisms underlying these health inequalities are not well understood, as the determinants of Black men’s health are rarely the focus of scholarly inquiry. Prior research shows that psychosocial factors such as stressors and coping resources affect physical health through multiple pathways (Pearlin, Schieman, Fazio, & Meersman, 2005; Thoits, 2010)—yet little is known about the extent to which such factors shape Black men’s health in later life (Thorpe, Duru, & Hill, 2015; Williams, 2003). Systematically investigating the psychosocial determinants of health among older Black men is especially important for several reasons. First, as a result of their intersecting racial and gender statuses, Black men experience psychosocial circumstances that are distinct from those experienced by their White and same-race female counterparts—circumstances that likely affect their health (Griffith, 2012; Watkins, Wharton, Mitchell, Matusko, & Kales, 2015). Second, the health of older Black men is shaped by their cumulative exposure to racialized and gendered risks, as well as their constrained access to salubrious resources over the life course (Brown, Hargrove, & Griffith, 2015). Third, a better understanding of the determinants of health among this vulnerable population is needed.
to develop efficacious strategies for eliminating health disparities and improving population health.

The Stress Process Model (SPM) is a leading framework in the social sciences that links psychosocial factors to health (Pearlin et al., 2005). Three key propositions undergird this model: (a) social context shapes exposure to stressors and access to coping resources, (b) stressors negatively affect health, and (c) social and personal resources positively influence health, both directly and indirectly by reducing the negative effects of stressors (Keith, 2014; Turner, 2013). Although research on the SPM has produced a wealth of knowledge regarding the social stratification of health, the extent to which this model adequately captures the psychosocial mechanisms underlying health among Black men in particular remains unclear. This is mainly because previous studies have often been based on majority-white samples or focused on between-group differences in health by either race or gender. A common limitation of this literature has been the implicit, tenuous assumption that relationships between psychosocial factors and health are similar across social groups. Such an assumption does not take into account the drastic differences in experiences and social realities faced by those located at varying intersections of race and gender hierarchies (Collins, 2015). The extent to which pathways to health may differ among broadly defined social groups is therefore unclear. To address this limitation of prior research, it is important to utilize a within-group approach to explicitly examine the psychosocial determinants of Black men’s health (Whitfield, Allaire, Belue, & Edwards, 2008).

Assessing the psychosocial mechanisms underlying Black men’s health is a growing topic of research, though the literature has been limited in several respects. For example, many studies have relied on small convenience samples or local epidemiologic surveys, limiting the generalizability of this research. Additionally, prior studies have tended to examine a single or small set of psychosocial factors, overlooking the cumulative and collective consequences of numerous psychosocial stressors and resources. Inattention to the simultaneous impacts of a range of psychosocial factors likely masks their unique effects on health (Thoits, 2010). Moreover, previous work has rarely examined the psychosocial determinants of Black men’s physical health in later life. These gaps in the literature hinder our understanding of how psychosocial processes that operate across the life course shape Black men’s health at older ages.

This study extends prior research by drawing on stress process (Pearlin et al., 2005) and intersectionality perspectives (Collins, 2015) to examine the extent to which an array of psychosocial factors impact health among a nationally representative sample of older Black men. In particular, we focus on three research objectives. First, we examine the individual, collective, and cumulative impact of commonly-used measures of stressors (e.g., discrimination, chronic and financial strains, traumas, and negative life events) on Black men’s health. Second, we investigate whether social and personal resources (e.g., social support, mastery, optimism, religiosity, and prayer) are protective for Black men’s health. Third, we examine the extent to which social and personal resources moderate the effects of stressors on health among older Black men. We focus on self-rated health in particular because it is a reliable and valid global measure of health, and it is predictive of subsequent morbidity and mortality (Brown, Richardson, Hargrove, & Thomas, 2016; Idler & Benyamini, 1997). Additionally, it does not require a clinical diagnosis, thereby minimizing potential biases stemming from racial and gender differences in health care access and utilization. Results of this study will provide critical insight into how well conventional psychosocial measures capture the mechanisms shaping older Black men’s health, and they will help inform policies and interventions aimed at improving their health.

Theoretical Framework

The SPM is a prominent framework that helps elucidate the health consequences of one’s location in the social structure. Specifically, this model attributes social inequalities in health to interrelationships among social contexts, stressors, social and personal resources, and manifestations of stress (Keith, 2014; Pearlin et al., 2005). Indeed, research provides strong support for the claim that stressors lead to worse physical health due to repeated activation of the body’s stress response (Thoits, 2010). This ongoing physiological activation has deleterious effects on a range of bodily systems, such as the immune, neuroendocrine, gastrointestinal, and cardiovascular systems (Bruce, Griffith, & Thorpe, 2015; McEwen & Seeman, 1999). Stressors also indirectly affect physical health by inducing negative emotional states and engagement in unhealthy coping behaviors (Jackson, Knight, & Rafferty, 2010). Furthermore, there has been considerable support for the SPM’s prediction that social and personal resources have both direct and stress-buffering effects on health (Wheaton, 2009). Another central proposition of the model is that stress exposure and the availability of coping resources are shaped by one’s social context (Pearlin, 1989). Consistent with this assertion, studies show that exposure to stressors and access to psychosocial resources vary along racial and gender lines (Keith, 2014; Thoits, 2010). However, few studies in the stress literature have examined the joint consequences of race and gender on the distribution of psychosocial risks and resources, and the processes through which they affect health.

Within the men’s health literature, there is a growing recognition of the importance of taking an intersectional approach to examining how race and gender combine to shape the experiences of Black men (Gilbert et al., 2016). Due to their dominant positions in the gender hierarchy as men, but subordinate positions as racial minorities, Black men face a number of unique gendered social norms and cultural expectations that, along with race/ethnicity, socioeconomic status (SES), and age, may negatively shape their behaviors and health (Griffith, Metzl, & Gunter, 2011).
Moreover, distress associated with their status inconsist-
ency (simultaneous membership in the dominant gender
group and subordinate racial group) may be particularly
pronounced for current cohorts of older Black men given
that they came of age during an era characterized by ramp-
 pant overt and de jure sexism and racism (Bonilla-Silva,
2014; Krieger, 2014). Indeed, research indicates that Black
men often experience distress associated with trying to
achieve hegemonic gender expectations (e.g., fulfilling the
traditional role as economic provider for their families) in
spite of their constrained economic opportunities, as well
as their exposure to racial discrimination in many areas of
life including educational and criminal justice systems, and
labor, housing, consumer and credit markets (Gilbert et al.,
2016; Pager & Shepherd, 2008; Pettit & Western, 2004;
Williams, 2003). In addition, Black men are subjected to
unique forms of gendered racial discrimination (Collins,
2015; Taylor, Miller, Mouzon, Keith, & Chatters, 2016)
and tend to experience especially high levels of financial
strain and chronic stressors (Brown et al., 2015).

Scholars have theorized that stress resulting from gen-
dered racial inequality is likely to accumulate and com-
pound over the life course, contributing to high rates of
unhealthy behaviors, poor health, and premature mortal-
ity among Black men (Thorpe et al., 2015). However, little
is known about the individual, collective, and cumulative
consequences of an array of stressors on Black men’s health,
especially in later life. Furthermore, although studies point
to the health benefits of social support and religion for
Black Americans specifically (Taylor, Chatters, & Levin,
2004; Watkins et al., 2015), no study has systematically
examined the joint and potentially interactive effects of a
broad range of stressors and psychosocial resources within
a nationally representative sample of older Black men.

Scant attention to the unique psychosocial pathways
that shape Black men’s health may reflect an implicit
assumption among previous studies that the SPM is invari-
ant across subpopulations. A central tenet of the SPM is
that one’s social location conditions the amount and kinds
of stress to which one is exposed, the resources one has
to cope with such stress, and the manner in which stress is
experienced and manifested (Pearlin, 1989; Williams,
Costa, & Leavell, 2010). In practice, however, little atten-
tion has been given to whether the psychosocial stressors
and resources most relevant for health may differ across
population subgroups. Given that Black men face unique
experiences across many domains of life, it is possible that
conventional measures of psychosocial factors, originally
developed to explain variations in health among largely
white samples, may not adequately capture complex psy-
chosocial–health processes among this marginalized group.

Stressors and Health

Over the last half century, substantial evidence has accumu-
lated indicating that social stressors have deleterious effects
on health. Scholarship in this area has generally focused on
specific discrete and chronic stressors, including discrimi-
nation (e.g., major events such as being unfairly fired or
denied a promotion; everyday experiences with discrimina-
tion such as being treated with less courtesy), chronic strains
(e.g., work–family conflict), traumas (e.g., being a victim of
or witnessing violence), recent life events (e.g., involuntary
job loss), and financial strain (e.g., difficulty paying bills)—
showing that each has harmful effects on mental and physi-
ical health (Thoits, 2010; Turner, Thomas, & Brown, 2016;
Umerson et al., 2016; Williams & Mohammed, 2013). Further-
more, a study by Sternthal, Slopen, & Williams (2011) illus-
trates the importance of examining the effects of cumula-
tive stress exposure, as well as the collective effects of numerous stressors in order to determine their
unique impacts on health.

The robust relationship found between these stress-
ors and health, coupled with findings that social location
shapes exposure to stressors, suggests that stress is a pri-
mary mechanism through which inequality “gets under
the skin” (Turner, 2013). Indeed, results from a recent
study indicate that Black men have particularly high lev-
els of exposure to both everyday and major discrimina-
tion, chronic stressors, and financial strain, and that these
factors contribute to their poorer health relative to White
men (Brown et al., 2015). Previous studies, however, have
rarely focused on the physical health of older Black men,
and typically have not considered how the impact of indi-
vidual stressors is influenced by exposure to an array of
other simultaneously experienced stressors as well as access
to psychosocial resources.

Social and Personal Resources and Health

In addition to highlighting the effects of stressors on health,
the SPM predicts that psychosocial resources impact health
outcomes both directly and indirectly by buffering the
negative impacts of stressors (Keith, 2014). There is con-
siderable evidence of the protective and stress-moderating
effects of numerous social and personal resources includ-
ing: social support (Thomas, 2016), religious beliefs and
practices (e.g., belief in the afterlife, church attendance, and
prayer; George, Kinghorn, Koenig, Gammon, & Blazer,
2013), mastery (i.e., sense of one’s life chances being under
one’s own control; Mizell, 1999; Pearl, 1999), and optim-
ism (i.e., view that the future will be pleasant; Rasmussen,
Scheier, & Greenhouse, 2009). Importantly, social sup-
port, religion, and faith have long been considered key
sources of strength and resilience, especially among Blakcs
(Stack, 1974; Taylor et al., 2004). As an adaptive response
to constrained opportunities and elevated exposure to
stressors stemming from structural racism, Blacks mobil-
ize support from their extended kin networks to ascer-
tain a variety of health-relevant social, economic, and
psychological resources (Stack & Burton, 1993; Taylor,
Mouzon, Nguyen, & Chatters, 2016). Furthermore, given
the historical and contemporary centrality of the church in the Black community, it is not surprising that Blacks have especially strong religious beliefs and high levels of church attendance and prayer (Taylor et al., 2004). In turn, these religious beliefs, practices and experiences appear to have salutary effects for older Blacks’ mental and physical health (Ellison, Hummer, Cormier, & Rogers, 2000; Taylor et al., 2004; Watkins et al., 2015).

Overall, existing evidence suggests that several psychosocial resources are important determinants of older Black men’s health. A number of gaps in the literature, however, prevent a comprehensive evaluation of this hypothesis. Importantly, research to date has not examined the individual and joint consequences of a range of psychosocial resources, particularly within the context of stress exposure and among a nationally representative sample of older Black men. Consequently, the extent to which stressors and social and psychological resources combine to shape health among older Black men remains unclear.

The Current Study

Our study is guided by three research questions. First, to what extent do social stressors individually, cumulatively and collectively affect older Black men’s self-ratings of health? Second, are social and personal resources directly protective of older Black men’s health? Third, to what extent do social and personal resources buffer the negative impacts of stressors on health among older Black men? Addressing these questions is essential for understanding the psychosocial determinants of health among a population that experiences unique social and economic disadvantages as well as a disproportionate burden of poor health.

Data and Methods

Sample

This study uses data from the Health and Retirement Study (HRS), a nationally representative study of U.S. adults over the age of 50. Blacks and Hispanics were oversampled to facilitate independent analysis of racial/ethnic groups. We combine information from the 2010 and 2012 Core Data and Psychosocial Modules (see Servais (2010) and Smith et al. (2013) for detailed information on these data sources). Half of the core panel participants were randomly assigned to complete the Psychosocial Module in 2010; the other half of the sample was assigned to complete the module in 2012. Although psychosocial data was also collected in 2006 and 2008, it is not included in this study due to inconsistent measurement of psychosocial factors between those years and 2010 and 2012. The analytic sample for this study includes U.S.-born respondents who self-identify as male and African American or Black, and are aged 51–81 years (1931–1959 birth cohorts) at the time of the interview (N = 593).

Outcome Measure

Self-rated health is measured by respondents’ answers to the question, “In general, would you say your health is: excellent, very good, good, fair, or poor?”; responses ranged from 1 (poor) to 5 (excellent). This global measure of health has been shown to be a reliable and valid measure of general health status among diverse populations in the U.S. (Brown et al., 2016; Idler & Benyamini, 1997). Supplemental analyses (available upon request) indicated that self-rated health at baseline is predictive of subsequent chronic conditions, disability, and mortality (net of SES factors) among older Black men in this study.

Covariates

Consistent with prior investigations of the stress-health relationship, we examine the impacts of several widely-used measures of psychosocial factors. Measures of stressors include everyday discrimination, major discrimination, chronic stressors, traumatic events, stressful life events, and financial strain. Stressors associated with perceived discrimination are captured using the validated Everyday Discrimination Scale (Williams, Yu, Jackson, & Anderson, 1997; 6-item mean index; \( \alpha = .840 \)) that assesses how often respondents experience daily hassles associated with perceived unfair treatment, as well as the Major Discrimination Scale (Williams et al., 1997; 7-item inventory), which captures perceptions of significant discriminatory events in various domains such as work, housing, lending, and criminal justice and health care systems. Chronic stressors (Troxel, Matthews, Bromberger, & Sutton-Tyrrell, 2003; 6-item inventory) include current and ongoing problems that have lasted twelve months or longer such as having a family member who has health problems or abuses drugs or alcohol; difficulties at work; housing problems; and strain in a close relationship. The measure of traumatic events (Krause, Shaw, & Cairney, 2004; 7-item inventory) assesses major acute stressors over the life course, such as the death of a child; natural disasters; combat involving firearms; and substance abuse or life threatening illnesses or accidents among family members. A five-item inventory of stressful life events over the last 5 years (Turner, 2013) summarizes recent acute stressors including involuntary job loss; prolonged unemployment for the respondent and other household members; moving to a worse residence or neighborhood; and robbery or burglary. An index of financial strain (Campbell, Converse, & Rodgers, 1976) assesses difficulty in meeting monthly payments on bills, ranging from 1 (not at all difficult) to 5 (completely difficult). We also include a cumulative measure of exposure to stressors (i.e., the number of stressors for which the respondent is in the highest-risk quartile; see Sternthal et al., 2011).

Measures of social and personal resources include positive social support, sense of mastery, optimism, religiosity, and frequency of prayer. A measure of positive social support (Cohen, 2004; 3-item mean index; \( \alpha = .851 \)) taps perceptions about emotional and instrumental support from
family and friends, with response categories ranging from 1 (not at all) to 4 (a lot). The mastery measure (7-item mean index; \( \alpha = .760 \)) is derived from the Pearlin Mastery Scale (Pearlin, 1999) and assesses the degree to which respondents believe that their life chances are under their own control. A 3-item mean index (\( \alpha = .738 \)) captures dispositional optimism overall and with respect to the future and uncertain times (Scheier, Carver, & Bridges, 1994). Religiosity (George et al., 2013) is measured by a 4-item mean index of religious beliefs, meaning and values (\( \alpha = .927 \)). Response categories for mastery, optimism and religiosity measures range from 1 to 6, with higher values indicating greater degrees of these constructs. Frequency of prayer (Taylor et al., 2004) is assessed by a single item, ranging from 1 (never) to 6 (more than once a day). To minimize the risk of biased estimates of the effects of psychosocial factors on health, all analyses adjust for several control variables including age (measured in years), years of education, logged household income, logged wealth, marital status, and year of interview. Detailed information on the operationalization of the study variables is included in the online Supplementary Material (see Supplementary Table A1), and weighted descriptive statistics are shown in Table 1.

### Analytic Strategy

OLS regression models are utilized to examine the relationships among psychosocial stressors, coping resources, and self-rated health. For ease of interpretation, we use a linear specification for the regression models, although supplemental analyses suggest that results are robust to alternative specifications (e.g., ordered logit). Estimates from regression models are reported as standardized coefficients. Psychosocial measures are introduced in a sequential manner in order to estimate (a) the individual, cumulative, and collective effects of stressors (Table 2, Columns 1–3, respectively); (b) the individual and collective effects of psychosocial resources (Table 2, Columns 4 and 5, respectively); and (c) the collective and interactive effects of stressors and psychosocial resources (Table 2, Columns 6 and 7, respectively). All analyses utilize sampling weights and are estimated using STATA 14.1.

### Results

Results from column 1 of Table 2 show estimates from separate models that examined the individual effects of each stressor. Findings indicate that, when examined individually, all of the stressors are statistically significant predictors of self-rated health. Specifically, everyday discrimination, major discrimination, chronic stressors, traumas, stressful life events, and financial strains are all associated with worse self-rated health. In addition, results from column 2 of Table 2 indicate that cumulative exposure to stressors is associated with health: compared to individuals who are in the highest-risk quartile on none or one of the stressors, those who are in the highest-risk quartile for three or four or more stressors have worse self-rated health.

Results shown in column 3 are based on estimates from a model that included the collective effects of each individual stressor as well as the cumulative stressors. When considered simultaneously, only chronic stressors and traumatic events have statistically significant negative effects on self-rated health. Findings from this model suggest that the number of stressors one is exposed to is not predictive of self-rated health, net of the collective effects of each stressor.

Column 4 of Table 2 presents estimates from separate models of the individual effects of psychosocial resources. In these models, higher levels of social support, mastery, and optimism are predictive of better self-rated health. However, when considered collectively (column 5), only mastery and optimism have statistically significant protective effects. Column 6 shows estimates from a model of the collective effects of all stressors and social and personal resources. Whereas chronic strains and traumatic events are the only stressors that are predictive of self-rated health, mastery and optimism are the only resources that have

### Table 1. Weighted Means and Proportions of Study Variables Among Older Black Men in the HRS (N = 593)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Mean</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>Self-rated health</td>
<td>2.924</td>
<td>(.057)</td>
</tr>
<tr>
<td>Stressors</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Everyday discrimination</td>
<td>1.885</td>
<td>(.057)</td>
</tr>
<tr>
<td>Major discrimination</td>
<td>1.134</td>
<td>(.076)</td>
</tr>
<tr>
<td>Chronic stressors</td>
<td>3.308</td>
<td>(.114)</td>
</tr>
<tr>
<td>Traumatic events</td>
<td>1.176</td>
<td>(.063)</td>
</tr>
<tr>
<td>Stressful life events</td>
<td>0.567</td>
<td>(.044)</td>
</tr>
<tr>
<td>Financial strain</td>
<td>2.425</td>
<td>(.054)</td>
</tr>
<tr>
<td>Cumulative stressors</td>
<td></td>
<td></td>
</tr>
<tr>
<td>High risk on 1 or no stressors</td>
<td>0.375</td>
<td></td>
</tr>
<tr>
<td>High risk on 2 stressors</td>
<td>0.228</td>
<td></td>
</tr>
<tr>
<td>High risk on stressors</td>
<td>0.194</td>
<td></td>
</tr>
<tr>
<td>High risk on 4 or more stressors</td>
<td>0.203</td>
<td></td>
</tr>
<tr>
<td>Coping resources</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Positive social support</td>
<td>3.031</td>
<td>(.034)</td>
</tr>
<tr>
<td>Mastery</td>
<td>4.800</td>
<td>(.055)</td>
</tr>
<tr>
<td>Optimism</td>
<td>4.621</td>
<td>(.061)</td>
</tr>
<tr>
<td>Religiosity</td>
<td>5.197</td>
<td>(.074)</td>
</tr>
<tr>
<td>Frequency of prayer</td>
<td>4.330</td>
<td>(.105)</td>
</tr>
<tr>
<td>Controls</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>62.225</td>
<td>(.373)</td>
</tr>
<tr>
<td>Education</td>
<td>12.203</td>
<td>(.138)</td>
</tr>
<tr>
<td>Income (Ln)</td>
<td>10.016</td>
<td>(.115)</td>
</tr>
<tr>
<td>Wealth (Ln)</td>
<td>6.740</td>
<td>(.414)</td>
</tr>
<tr>
<td>Married</td>
<td>0.629</td>
<td></td>
</tr>
<tr>
<td>Measures from 2012</td>
<td>0.514</td>
<td></td>
</tr>
</tbody>
</table>

Note: 2010–2012 Health and Retirement Study. HRS = Health and Retirement Study.

*Means for dummy variables can be interpreted as the proportion of the sample coded 1 on that indicator.*
The fact that these results are similar to those presented in columns 3 and 5, suggests that personal resources do not mediate the effects of stressors on health (and vice versa).

Ancillary analyses (available upon request) examined potential moderating effects of each of the psychosocial resources on each of the stressors, though the only statistically significant interaction was between traumas and prayer. Results from column 7 of Table 2 reveal that frequency of prayer buffers the negative effects of traumatic events on self-rated health. Figure 1 graphically illustrates how traumas have less harmful effects on self-rated health among individuals who pray more frequently, compared to those who pray less frequently. This figure also shows that whereas greater frequency of prayer is associated with slightly worse self-rated health among individuals who report zero or one traumatic event, it is has strong protective effects among those who have experienced numerous traumas. Supplemental analyses (not shown for the sake of concision) also indicated that many of the control variables were associated with self-rated health in expected ways. For example, age was predictive of worse self-rated health, while education, income, and wealth were protective of self-rated health. Marriage and year of interview

<table>
<thead>
<tr>
<th>Stressors</th>
<th>1&lt;sup&gt;i&lt;/sup&gt;</th>
<th>2&lt;sup&gt;i&lt;/sup&gt;</th>
<th>3&lt;sup&gt;e&lt;/sup&gt;</th>
<th>4&lt;sup&gt;i&lt;/sup&gt;</th>
<th>5&lt;sup&gt;e&lt;/sup&gt;</th>
<th>6&lt;sup&gt;h&lt;/sup&gt;</th>
<th>7&lt;sup&gt;i&lt;/sup&gt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>Everyday discrimination</td>
<td>-.121**</td>
<td>-.038</td>
<td>-.017</td>
<td>-.013</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Major discrimination</td>
<td>-.126*</td>
<td>-.028</td>
<td>-.024</td>
<td>-.034</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Chronic stressors</td>
<td>-.243***</td>
<td>-.180**</td>
<td>-.163*</td>
<td>.179**</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Traumatic events</td>
<td>-.203***</td>
<td>-.154**</td>
<td>-.146**</td>
<td>-.430***</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Stressful life events</td>
<td>-.120*</td>
<td>-.036</td>
<td>-.024</td>
<td>-.021</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Financial strain</td>
<td>-.165**</td>
<td>-.089</td>
<td>-.084</td>
<td>-.084</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Cumulative stressors

| High risk on 1 or no stressors (ref. group) |  |               |
|--------------------------------------------|----------------|
| High risk on 2 stressors                   | -.034          | .069          | .068          | .074          |              |              |              |
| High risk on 3 stressors                   | -.100*         | .063          | .049          | .057          |              |              |              |
| High risk on 4 or more stressors           | -.252***       | .043          | .028          | .030          |              |              |              |

Social and personal resources

| Positive social support                  | .129**         | .106          | .041          | .049          |              |              |              |
| Mastery                                   | .170**         | .138*         | .122*         | .118*         |              |              |              |
| Optimism                                  | .128*          | .098*         | .108*         | .109*         |              |              |              |
| Religiosity                               | .037           | .042          | .036          | .038          |              |              |              |
| Frequency of prayer                       | -.069          | -.101         | -.078         | -.098**       |              |              |              |

Interactions between stressors and resources

| Traumatic events × Frequency of prayer    | .055**         |              |              |              |              |              |              |

Intercept

| R²                                          | .180          | .219          | .184          | .255          | .271          |              |              |

Note: 2010–2012 Health and Retirement Study.

<sup>a</sup>Estimates from ordinary least squares regression models; standardized coefficients are presented. <sup>b</sup>All models control for age, education, income, wealth, marital status, and the year of interview. Separate models for each stressor. <sup>c</sup>Single model including number of stressors in the highest-risk quartile. <sup>d</sup>Single model of the collective effects of individual stressors and number of stressors in the highest risk quartile. Separate models for each social and personal resource. Single model including all five social and personal resources simultaneously. <sup>e</sup>Full model of the collective effects of all stressors and coping resources. Full model with collective effects and statistically significant interactions between stressors and resources. For the sake of concision, model fit statistics are not shown for the separate models (available upon request).

*<i>p < .05, **p < .01, ***p < .001.</i>
were not associated with self-rated health. The $R^2$ statistic for the model presented in column 7 indicates that the model explains 27.1% of the variation in self-rated health.

**Discussion**

Given that Black men have some of the worst health profiles and shortest life expectancies of all race–gender groups in the U.S., it is especially important to understand the psychosocial determinants of their health (Thorpe & Halkitis, 2016). While research on the SPM has provided ample evidence that psychosocial factors affect health, the extent to which commonly-measured stressors and coping resources adequately capture key psychosocial mechanisms that shape health among older Black men in particular remains unclear. This study is among the first to systematically examine the effects of a wide range of psychosocial stressors and resources among a nationally-representative sample of older Black men.

Findings illustrate the importance of examining the combined effects of numerous stressors rather than focusing on the consequences of individual stressors. Initial analyses in this study suggested that when considered individually, all of the stressors and the number of cumulative exposures to stressors were predictive of worse self-rated health. However, subsequent analyses that investigated the collective effects of stressors revealed that only two of the six stressors—chronic stressors and traumatic life events—had independent effects on self-rated health. This result is consistent with previous research documenting the particularly harmful effects of stressors that are recurring and/or severe (Thoits, 2010). Importantly, differences in the predictive power of stressors when considered individually versus in the context of other stressors underscore the importance of investigating numerous stressors that are experienced simultaneously to determine their unique effects on health.

Our findings also provide mixed evidence for the protective effects of social and personal resources considered in this study, and limited support for the notion that they operate as stress buffers among older Black men. When psychosocial resources were considered collectively, two of the five psychosocial resources examined—mastery and optimism—were significantly protective of self-rated health. Moreover, investigations of all possible stress-buffering processes revealed only one instance of stress-moderating effects. Specifically, greater frequency of prayer buffers the deleterious effects of traumatic events on self-rated health. These results highlight the importance of considering the impacts of individual psychosocial resources within the context of a wide array of other stressors and coping resources.

Overall, results from this study suggest that commonly-used psychosocial measures are moderately predictive of self-rated health among older Black men. There are several possible explanations for, and implications of, these findings. For example, scholars have posited that late life stressors may have muted effects on the health of older Blacks. These relatively moderate effects may be attributed to two factors: (a) older Black men, who have often endured elevated exposure to stressors throughout their lives, have become accustomed to managing stressors; and (b) mortality selection prior to late life leads to samples of older Black men who primarily represent those who are most resilient or adept at coping with the harmful effects of stressors (Ayalon & Gum, 2011; Barnes et al., 2008). A key implication of findings from this study is that conventional measures of stressors and coping resources—originally developed to account for variance in health outcomes among predominantly white samples—may not fully capture the psychosocial factors most salient for older Black men’s health. Thus, it is important that future research on older Black men’s health incorporates measures of stressors and resources that better reflect their experiences. One source of stress that is unique to men of color stems from racialized understandings and expectations surrounding gender and masculinity. For example, older Black men likely experience distinctive forms of distress as a result of their efforts to attain statuses and fulfill roles that conform to hegemonic gender expectations, while also experiencing constrained economic opportunities due to discrimination across myriad domains (Williams, 2003). Griffith, Gunter, and Watkins (2012) also highlight the importance of considering how masculinities in general and Black masculinities in particular are shaped by structural forces and cultural expectations, which ultimately lead to poor health. They note that several aspects of masculinity (e.g., male norms, masculine ideologies, and machismo) are associated with distress, though relatively little is known about the effects of racialized masculinities on physical health.

Furthermore, experiences of discrimination other than those traditionally measured are likely relevant for the physical health among older Black men. Given that discrimination attributable to being a Black man is distinct from discrimination attributable to being Black and a man (e.g., the sum of racial and gender discrimination; Brown et al., 2016; Collins, 2015), it may be useful to explicitly examine the impact of gendered racial discrimination for Black men’s health. For example, Black men’s disproportionately high risks of contact with the criminal justice system (Alexander, 2010; Pettit & Western, 2004) likely play a significant role in shaping their health. Indeed, previous research suggests that incarceration has deleterious health consequences because it is distressing, stigmatizing, increases exposure to infectious diseases, and often leads to stress proliferation across many areas of life such as unemployment, financial hardship, and family strain (Massoglia & Pridemore 2015).

Stressors beyond the individual level are also important for understanding the stress-health link among Black men. For example, Black men may experience stress vicariously as a result of family and close friends being exposed to race-based and general stressors (Williams & Mohammed, 2013). Neighborhood stressors such as exposure to toxins,
violence, and surveillance may also negatively affect Black
men’s health (Williams, 2003). Indeed, a recent study by
Ray (2017) suggests that middle class Black men are less
likely to be physically active in predominantly White neigh-
borhoods than in racially diverse or predominantly Black
neighborhoods because they do not feel comfortable in
these spaces due to negative stereotypes about the criminal-
ity of Black men. Moreover, Lewis, Cogburn, & Williams
(2015) posit that macro-level or large-scale stressors such as
highly-publicized instances of police brutality and wrong-
ful convictions are likely to cause distress for minorities.
Awareness of these incidents may be particularly stressful
for Black men given that they are often the victims of these
tragic events. Further research is needed to identify the mul-
tilevel stressors that are most influential in shaping older
Black men’s health.

Findings from this study also raise questions about why
several of the social and personal resources examined were
not protective of health and whether there are other psy-
chosocial factors that may be sources of resilience for Black
men’s health. While the precise explanation for the modest
direct and moderating effects of psychosocial resources is
unclear, it is plausible that their salutary effects are diluted
or offset by the pervasive and cumulative adversity that
many older Black men have endured over their lives. By mid-
dle or later life, Black men have been exposed to more than
a half century of various forms of racism (e.g., institutional,
interpersonal, vicarious, internalized, cultural, etc.), which
has often resulted in the experience of substantial social,
economic, psychological, and health disadvantages (Brown
et al., 2015; Keith, 2014). Under these circumstances, the
contemporaneous social and personal resources examined in
this study may not be adequate for ameliorating Black
men’s cumulative adversity and stress burden. The litera-
ture is not clear about which psychosocial resources are
likely to be most salubrious for older Black men. Previous
studies have suggested that strong racial identity is protec-
tive and buffers the effects of discrimination on Blacks’ psy-
chological well-being (Sellers, Caldwell, Schmeelk-Cone, &
Zimmerman, 2003), though the evidence is mixed and little
is known about the effects of racial identity on older Black
men’s physical health. We echo Watkins and colleagues’
(2015) call for further research that utilizes mixed methods
and qualitative approaches for identifying the availability
and effectiveness of culturally appropriate coping mecha-
nisms among older Black men.

It is important to note several limitations of the current
study. First, given the cross-sectional nature of our analy-

ses, we are unable to examine lagged effects or rule out
the possibility of reverse causality, though there is solid
evidence from previous longitudinal studies suggesting that
psychosocial factors have causal effects on health (Thoits,
2010). A second limitation of the study concerns possible
selection biases. Specifically, because this study does not
include Black men who died before age 50, or those who
are homeless or institutionalized (e.g., incarcerated or liv-
ing in a nursing home), we are likely missing Black men
who are most disadvantaged with respect to stress expo-
sure, coping resources, and health. Thus, findings are only
generalizable to community-dwelling Black men who sur-

vive past the age of 50. Third, due to data limitations, this
study is unable to fully capture life course processes shaping
older Black men’s health. Research suggests that cumula-
tive adversity and stressors across the life course, especially
during early life, negatively affect subsequent attainment
processes, stress exposure, availability of coping resources,
and ultimately, late life health (Ferraro et al., 2016; Turner
et al., 2016). Fourth, it is beyond the scope of this study
to identify the specific biological pathways through which
psychosocial factors shape various health outcomes. Future
research should address these important topics as well as
the extent to which psychosocial mechanisms underlying
Black men’s health are contingent on social factors such as
class, skin color, nativity, and sexuality (Gilbert et al., 2016).

Despite these limitations, this study makes several con-
tributions to the literature. Importantly, this study makes
visible the experiences of an often-overlooked social group
and highlights how their unique position in the social hier-
archy differentiates the mechanisms underlying health.
Furthermore, in addition to identifying the health conse-
quences of specific psychosocial factors among older Black
men, results from this study underscore the importance
of considering the collective and cumulative effects of an
array of stressors and resources in order to understand
complex psychosocial processes. More broadly, findings
from this study indicate that commonly-used measures of
psychosocial factors have limited utility for understanding
older Black men’s self-rated health, as evidenced by their
modest explanatory power among this population sub-
group. This suggests that scholars should not assume that
the SPM works similarly across or within diverse groups.
Rather, results from this study underscore the need for
future research that examines how health is shaped by a
more comprehensive set of psychosocial stressors and
resources that better reflect the experiences of older Black
men. Valuable information gained from this line of research
will be critical for developing policies and interventions
aimed at improving their health.

Supplementary Material

Supplementary data are available at The Journals of
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Conflict of Interest
The authors declare no conflict of interest.

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