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Assessment of Black Patients' Perception of Their Dermatology Care

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IMPORTANCE The availability and quality of skin and hair care for black patients in the United States has been a subject of growing interest in dermatology. There is limited understanding of the perceptions of black patients about the care they receive from dermatologists and the factors affecting their care satisfaction.

OBJECTIVE To elucidate black patients' perceptions of their dermatology experience in and outside of a skin of color clinic (SOCC).

DESIGN, SETTING, AND PARTICIPANTS A cross-sectional study involving a survey and focus groups was conducted including adult black patients treated in an SOCC. Recruitment was conducted April through June 2015 through clinic-posted flyers. Participants engaged in 1 of 4 focus groups on July 14, 15, 29, or 30, 2015, and completed a survey. Data were analyzed March 2016 through June 2017.

MAIN OUTCOMES AND MEASURES Planned outcomes of the focus groups were black patients' inductively generated themes on their perspectives and experiences in dermatology clinics. Planned outcomes of the survey were patients' ratings of SOCC and non-SOCC dermatologists in terms of interaction style, cultural awareness, and treatment satisfaction. Importance of patient-dermatologist racial concordance was a planned outcome in both measures. Given lack of existing prior research, no specific hypotheses were generated.

RESULTS Of the 19 adult black patients who participated in the study, 18 (95%) were women, and the mean (SD) age was 50.0 (14.2) years. All patients reported positive experiences in the SOCC. Compared with non-SOCC dermatology treatment experiences, patients reported higher levels of overall satisfaction with SOCC dermatologists (t_{13} = 2.85; P = .01). Patients perceived that SOCC dermatologists were better trained to care for black patients (t_{13} = 4.42; P = .001); showed patients greater respect and dignity (t_{13} = 3.37; P = .005), as well as understanding (t_{13} = 2.56, P = .02); and were more trustworthy (t_{13} = 3.47; P = .004). The majority of the comments in the focus groups (n = 207) described 2 themes: dermatologists' interaction style (62/207; 30.0%) and knowledge about black skin and hair (42/207; 20.3%). Other themes were partnering with patients on outcomes (17/207; 8.2%), shared life experiences (14/207; 6.8%), and economic sensitivity (7/207; 3.4%). These themes accounted for a large part of the participants' discussion. Of all respondents, 71% (12/17) stated that they would prefer a black (or race concordant) dermatologist; this included 91% (10/11) of the race-concordant group and 33% (2/6) of the race-discordant group.

CONCLUSIONS AND RELEVANCE Participants reported that the SOCC dermatologists provided unique and uniformly beneficial care to black patients. Care satisfaction appeared most related to dermatologists' interpersonal style and specialized knowledge in care of black skin and hair. Findings suggest that black patients' dermatologic care satisfaction would increase if dermatologists underwent enhanced residency training in skin of color, cultural competency, cost-conscious care, and empathic communication skills, and if there were greater dermatology workforce diversity.

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Author Audio Interview

Supplemental content

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The availability and quality of skin and hair care for people of color, including black patients in the United States, is a subject of growing interest in dermatology. A focus exists on increasing racial and ethnic diversity in the dermatology workforce[1-6] and clinical trials,[7] specific diseases and conditions affecting black patients,[8] the paucity of educational materials on skin of color,[9] the lack of a curriculum devoted to the care of skin and hair of black patients,[10] and dermatologic health disparities.[11]

To date, there have been limited attempts to study the perceptions black patients have about the care they receive from dermatologists, in either skin of color clinic (SOCC) or non-SOCC settings, nor their conception of what factors might lead to improvement in care.[12,13] The objective of this study is to explore black patients' experiences in dermatology. The goal was to identify factors most important in defining black patients' overall experiences and to examine the topic of dermatologist-patient concordance among black patients.

Key Points

Question How do black patients treated in a skin of color clinic vs a conventional dermatology clinic perceive their experiences of dermatology care?

Findings In this cross-sectional study, 19 black patients seen by dermatologists experienced in treating skin of color at a specialized clinic reported increased satisfaction with their dermatology care compared with prior experiences; satisfaction related to multiple factors, including dermatologist knowledge about black skin and hair; and a culturally sensitive interaction style. Patient-dermatologist racial concordance was preferred but not required for a positive experience.

Meaning Expertise of dermatologists in skin of color, such as those found in a skin of color clinic, improves black patients' dermatology experience.

Methods

A focus group (FG)[14,15] is a social science research method designed to elucidate underlying relevant themes to a given topic, specifically when that topic has not been studied previously. It is an inductive exploratory method in which relevant themes are derived from participants' voices and lived experiences. Focus groups consist of a synergistic conversation among 4 to 12 people with a homogenous background. To increase validity, 3 to 4 FGs on the same topic are typically employed. Focus groups are not intended to create generalizable knowledge. Instead, generalizability of identified themes is established through future deductive studies.[16] Given the current limited state of the literature on black patients' perception of their dermatology care, employing the FG methodology was deemed most appropriate for the purpose of this study.

Four institutional review board-approved, semistructured FGs were used to gather participants' perspectives on their dermatology care. All adult black patients treated in the SOCC during the recruiting period of April through June 2015 were eligible for participation. Participants were recruited through clinic flyers; a $25 participation incentive was provided. All eligible patients were invited to register for a FG date on July 14, 15, 29, or 30, 2015.

Focus groups were held at Northwestern University Feinberg School of Medicine in Chicago, Illinois, a racially diverse city with 31% of residents black[17] and approximately 12 to 15 black dermatologists. The FGs occurred approximately 1 to 90 days after patients' general clinic visit, during which they received the recruitment flyer.

Two FGs consisted of patients seen by a race-concordant dermatologist (S.P.), and 2 by a race-discordant dermatologists of color (R.V.K.). Both dermatologists were faculty in the Northwestern Center for Ethnic Skin and have clinical and research interest and publications in skin of color. A semistructured series of 8 questions were asked during each FG: 7 questions on dermatology experiences and perceptions (3 questions on SOCCs, 3 questions on dermatologists, 1 catchall additional comment) and 1 item on training dermatologists for interacting with black patients. There were 2 facilitators for each FG; all facilitators were medical students of color trained in FG techniques.

A brief Likert-scale survey (Supplement), developed specifically for this study, was administered immediately prior to the FG. The survey queried participants on their satisfaction with dermatologists seen in the SOCC and otherwise, the perceived interaction style and cultural awareness of dermatologists, and preference for racial concordance with their dermatologist.

Data Analysis

Qualitative FG data were analyzed using the conventional content analysis method.[18] Three of the authors (S.P., K.G.R., N.P.) first independently read each transcript in entirety and identified potential, underlying themes in the transcript content. They then met as a group to compare identified themes, and through consensus discussion, agree on a list of potential themes. Two students (1 psychology, 1 medical) then independently read each transcript and marked when an occurrence of a potential theme occurred. Interrater reliability was calculated for student markings. For content with discrepant student codings, students discussed and made a consensus coding determination.

To be formally designated a theme, there were 2 criteria: to hold a minimum of 3 unique responses across all 4 transcripts pertaining to the theme, and mention of the theme by at least 2 FGs. Theme relative importance was determined by its relative frequency of occurrence. To compare the relative importance of themes across the racially concordant and discordant groups, nonparametric χ^2 test statistics were used. Survey data were analyzed using descriptive and inferential (*t* test) statistics. The significance level was 1-tailed for χ^2 test and 2-tailed for *t* test, each at $P \leq .05$.

Informed Consent of Study Participants

Participants provided written informed consent. Protocol was reviewed and approved by the Northwestern University Institutional Review Board and reviewed and deemed exempt by the institutional review boards of the University of Wisconsin-Stout and Duke University Medical Center.

Results

Participants

Nineteen black adult patients participated, 11 in the concordant FGs and 8 in the discordant FGs. Eighteen participants were women (95%), and the mean (SD) age was 50.0 (14.2) years. Of the participants, 56% (10/18) reported not intentionally seeking a SOCC or a black dermatologist.

Fourteen (74%) patients had previously seen a dermatologist, with 3.5 as the average number of previous dermatologists seen. Previous dermatology settings included 3 within a university clinic, 8 at a small private clinic, 7 at a larger dermatology practice, and 0 at another SOCC; 4 participants had been to multiple dermatology settings prior to the SOCC. Five patients were seen previously by only white dermatologists, 5 patients had previously seen mostly white dermatologists but at least 1 dermatologist of color, 2 had seen mostly dermatologists of color but at least 1 white dermatologist, 1 patient had seen only dermatologists of color, and 1 patient had equal experience with both white dermatologists and dermatologists of color.

A total of 51 pages of transcribed discourse resulted from the 4 FGs, from which 243 unique statements were delineated: 215 from the dermatology experiences and perceptions questions, and 28 from the training question.

Theme Identification and Relative Importance

From the 215 unique statements, 9 distinct themes were identified and consisted of 207 statements (8 statements did not fit theme criteria). Interrater reliability of students' initial transcript coding was 75%; after discussion of content with discrepant codings, interrater agreement was 100%. The following themes were identified.

Interaction Style

Participants valued dermatologists who listened to them, normalized the patient's experience, involved them in decision-making, and educated them about their skin condition. Participants were critical of dermatologists who did not perform a complete examination or seemed to be avoiding physical contact during the examination. One participant observed, "I don't want to come to a person who isn't comfortable touching me." Another participant praised the SOCC dermatologist because "she was very sensitive and didn't have a problem touching your skin."

Dermatologist Knowledge

Participants valued dermatologists who demonstrated experience and knowledge in the care of disorders of black skin and hair. They cited frustration with dermatologists who lacked this knowledge. One participant suggested this kind of special knowledge is more important in dermatology than in most, if not all, other medical specialties: "…You can't tell a black person's lung from a Caucasian person's lung, but skin…is different. There is a difference culturally, environmentally, and socially."

Patients' Concordance Preference

Some participants expressed preference for racial concordance with their dermatology provider ("I will never, ever have a dermatologist that's not AA [African American] ever again."), while others did not ("As long as they're knowledgeable it doesn't matter.").

Patient Comfort and Patient Confidence

Participants expressed an increased sense of comfort and confidence being seen in a SOCC. As one participant stated, "I think the knowledge, or what she learned in school, with her own personal experience with her own hair, like my hair—it's just been very comfortable."

Dermatologist Partners With Patients in Focusing on Outcomes

Participants perceived that the shared objective for both dermatologist and patient was clinical improvement through accurate diagnosis, appropriate treatment, and patient understanding of their condition.

Shared Life Experience

Participants who had a race-concordant dermatologist felt that a black dermatologist would be most likely to understand their personal experience with black skin and hair. As stated by one race-concordant participant, "There is an edge that an AA doctor has about AA people and skin and their hair. Not all things are taught. You may not know that I don't wash my hair every day. You know what, but as an AA woman she already knew. So even though you've got all the training in the world, some things you are just born with."

Patient Education

Participants expressed a sense of enlightenment as to the existence of biological and treatment differences between white skin and hair and that of other races. They valued being made aware of these facts.

Dermatologist Economic Sensitivity

Participants appreciated dermatologists who were aware of medication cost and considered this when developing a treatment plan.

Training-Item Themes

When asked how to educate dermatologists about interacting with black patients, a total of 28 unique statements were made, from which 3 themes were identified. Participants indicated that training should include specific knowledge on black skin and hair (11 statements), skills in interacting with black patients (10 statements), and including more black patients in dermatology research (3 statements). Four statements did not meet theme criteria.

Difference in Theme Importance Across Concordance Groups

Differences were found across the concordant and discordant groups, as indicated in **Table 1**. Table 1 lists each theme, the number of FGs in which it was mentioned, the frequency of occurrence for the full sample and concordant and discordant groups, and results of statistical tests comparing the relative frequency of each theme across the 2 concordant groups (concordant vs discordant groups). The concordant group

Table 1. Focus Group–Derived Themes

Theme	Theme Mentioned in Groups, No. (%)	Statements, No. (%)			P Value
		All (n = 207)	Race Discordant Group (n = 92)	Race Concordant Group (n = 115)	
Dermatologist interaction style	4 (100)	62 (30.0)	20 (21.7)	42 (36.5)	.02
Dermatologist knowledge	4 (100)	42 (20.3)	25 (27.2)	17 (14.8)	.03
Patients' concordance preference	4 (100)	19 (9.2)	10 (10.9)	9 (7.8)	.45
Patient comfort	4 (100)	18 (8.7)	5 (5.4)	13 (11.3)	.14
Patient confidence	4 (100)	18 (8.7)	11 (12.0)	7 (6.1)	.14
Dermatologist partners with patients in focusing on outcomes	4 (100)	17 (8.2)	13 (14.1)	4 (3.5)	.01
Shared life experience	3 (75)	14 (6.8)	1 (1.1)	13 (11.3)	.00
Patient education	3 (75)	10 (4.8)	5 (5.4)	5 (4.3)	.72
Dermatologist economic sensitivity	4 (100)	7 (3.4)	2 (2.2)	5 (4.3)	.39

Table 2. Participants' Satisfaction Ratings of Non-SOCC and SOCC Dermatologists From Survey Data

Question	Non-SOCC (n = 19)		SOCC (n = 19)		P Value
	Respondents, No. (%)	Score,[a] Mean (SD)	Respondents, No. (%)	Score,[a] Mean (SD)	
Overall care	14 (74)	2.71 (1.33)	14 (74)	4.07 (1.44)	.01
Cultural sensitivity to black skin	14 (74)	2.96 (1.28)	14 (74)	4.43 (1.09)	.01
Knowledge of black skin	14 (74)	2.82 (1.54)	14 (74)	4.36 (1.08)	.02
Knowledge of black hair	11 (58)	2.82 (1.33)	11 (58)	3.09 (1.51)	.39
Change in condition	12 (63)	2.88 (1.13)	12 (63)	3.92 (1.08)	.02

Abbreviation: SOCC, skin of color clinic.

[a] 5-point Likert scale: 1 = very unsatisfied, 2 = unsatisfied, 3 = neither satisfied or unsatisfied, 4 = satisfied, 5 = very satisfied.

Table 3. Ratings of Dermatologists' Interaction Style and Cultural Awareness From Survey Data

Question	Respondent Score,[a] Mean (SD) (n = 19)		P Value
	Non-SOCC	SOCC	
Respondents, No. (%)	14 (74)	14 (74)	
Showed me respect and dignity	3.79 (0.98)	4.79 (0.43)	.01
Understood me	3.25 (1.34)	4.5(1.09)	.02
Was trustworthy	3.57 (0.94)	4.71 (0.47)	.00
Well trained to treat black patients	3.04 (1.08)	4.64 (0.63)	.00

Abbreviation: SOCC, skin of color clinic.

[a] 5-point Likert scale: 1 = strongly disagree, 2 = disagree, 3 = neither agree or disagree, 4 = agree, 5 = strongly agree.

found dermatologist interaction style ($\chi^2_1 = 5.32$; $P = .02$) and shared life experiences ($\chi^2_1 = 8.46$; $P = .00$) to be more important; the discordant group found dermatologist knowledge ($\chi^2_1 = 4.85$; $P = .03$) and dermatologist partnering with the patient to focus on outcomes ($\chi^2_1 = 7.69$; $P = .01$) to be more important. Although both groups made a similar number of statements regarding their preference for racial concordance, all (9/9; 100%) of the statements in the concordant group indicated a preference for a racially concordant dermatologist; only 20% (2/10) of statements did so in the discordant group.

Survey Data

As compared to non-SOCC dermatologists, more favorable scores were found for the 2 SOCC dermatologists in terms of patient satisfaction (**Table 2**) and interaction style and cultural awareness (**Table 3**).

For those preferring a black dermatologist, an open-ended survey question (n = 10 responses) indicated 40% (n = 4) believed a black dermatologist would have better knowledge of black patients and 40% (n = 4) an ability to relate to black patients owing to their shared experiences and culture. The difference in perception of knowledge of black hair between SOCC and non-SOCC dermatologists was not statistically significant, though focus group discussions suggested otherwise. The reason for this is not clear, and data were not gathered to help determine the reason for this apparent discrepancy.

Discussion

To our knowledge, prior to this study, little was known regarding black patients' perceptions of their dermatology care, either within or external to an SOCC. This study appears to be the first to investigate and provide preliminary findings for addressing this knowledge gap.

When provided an opportunity to voice their perspectives regarding dermatology care, participants inductively generated 9 themes, 5 of which pertained to dermatology providers' behaviors and characteristics (ie, interaction style, knowledge, partnering with patients in focusing on outcomes, economic sensitivity, shared life experiences), and 4 to patients themselves (ie, comfort, confidence, education, concordance preference). The patient-focused themes are predominately a consequence of the identified dermatology

provider behaviors and characteristics. Furthermore, because individual dermatology provider behaviors are changeable and overall dermatology workforce characteristics modifiable, they will be the focus of this discussion.

Across all respondents, the dermatologist's interaction style was identified as the most important factor. There were many elements to this interaction style, including oral communication, body language, performance of the physical examination and patient involvement and partnering. In previous studies unrelated to race or ethnicity, many of the specific interaction behaviors identified in this study (eg, joint decision-making, patient education) were critical aspects of patient-centered care, which, in turn are independently associated with increased patient satisfaction.[19] Similarly, within dermatology, a dermatologist with good character (eg, kind, open, honest, personable) and effective communication were of utmost importance to patients and resulted in highest satisfaction scores.[20]

Regarding physical interactions, participants reported some non-SOCC dermatology providers performed only a cursory skin examination and seemed to avoid physical contact (eg, examined hair with the end of a pencil, not being examined at all). Some patients interpreted such behaviors as a sign of disrespect and, for them, this raised concern about racial sensitivity on the part of the dermatologist.

Specialized knowledge in the care of black skin and hair was another top theme. Participants expressed frustration when relating their prior interactions with dermatologists who seemed to lack this knowledge and appreciated the expertise of dermatologists in the SOCC. The importance of dermatology training programs, textbooks, and educational meetings to provide sufficient education about black skin and hair has been documented.[9,21] Among dermatology residency programs in 2008, only 25.4% of chief residents and 19.5% of dermatology program directors reported having any lectures on skin of color from an acknowledged expert.[10] Fortunately, dermatology residency programs are making efforts to incorporate training on treatment of skin of color into their curriculum.

The rising cost of dermatologic treatments has led to significant barriers to care.[22] Some participants noted that dermatologists in the SOCC were aware of this issue and carefully considered cost when prescribing a new medication. By contrast, a few participants observed that their non-SOCC dermatologists lacked this sensitivity.

Regarding the importance of patient-dermatologist racial concordance in dermatology care, this study sheds some preliminary light. First, though there were differences in relative theme importance between race concordant and discordant groups, dermatology provider interaction style and knowledge of black skin and hair were the 2 most important factors for both groups, accounting for approximately half of their respective statements. Second, though most participants preferred a black dermatology provider, participants were appreciative of the care they received from their SOCC dermatologist, regardless of their dermatologist's race. Because participants had an overwhelmingly positive experience in the SOCC, almost all those who had experienced a racially concordant dermatologist preferred a black dermatologist, while those who had not, did not. Collectively, these results indicate that for most participants, culturally sensitive care was most important. Concordance was preferred but not required for a positive experience. Third, some concordant group participants expressed a "sense of comfort" when greeted by a black dermatologist and felt intuitively that that dermatologist would be more likely to understand their personal experience and their black skin and hair disorders. Although a definitive conclusion from this study is not possible, we speculate that this sense of comfort is partly derived from the shared lived experience of black individuals.

This study was limited to the discussion of black patients. However, other authors evaluated racial concordance and discordance in dermatology among multiple races/ethnicities. Interestingly, shared similarities and participatory decision-making were relevant to all patient-dermatologist interactions and more likely in race concordant pairs.[12]

This study provides insight into the value added by SOCCs. Although almost two-thirds of study participants with previous dermatology experience had at least 1 prior dermatologist of color, they reported greater satisfaction with their overall care, and perceived improvement in their underlying dermatologic condition, at the SOCC. This may be related to the specific dermatologists encountered. Likely, similar to other specialty clinics in dermatology, centers and clinics with a particular focus on skin of color appear to add value by promoting training in skin of color, fostering related research, and attracting dermatologists with desired expertise.

Limitations

Generalizability is limited by the relative lack of male participants and by the FG method itself, because by design it involves a small sample. Validity is limited because there were no comparative focus groups with black patients not seen in a SOCC, nor information gathered on how long ago non-SOCC dermatologists were seen, as recently there has been relatively more emphasis on skin and hair training of minority races.

Participants' overwhelmingly positive SOCC experiences could be due to selection bias because those with positive feelings toward the SOCC or their dermatologist were possibly more motivated to participate. Additionally, findings of increased satisfaction with SOCC dermatology providers could be due to a confirmatory bias of patients believing SOCCs would be more beneficial. However, this bias potential is minimized because 56% of participants reported not intentionally seeking a SOCC or a black dermatologist.

When exploring racial concordance, there were limitations owing to study design. First, differences found across patients seen by a concordant dermatologist, as compared with a discordant, could be solely due to the unique personalities and interpersonal style of the 2 participating dermatology providers. Second, all participants had a dermatologist with skin of color within a SOCC, potentially implying an inherent increased sensitivity to skin of color issues by their dermatologist. As such, while studying concordance, differences found across the concordant and discordant groups may be muted when compared with white dermatologists. Third, findings on the importance of concordance focused only on patient perceptions and not objective measures of clinical benefit.

Conclusions

Although findings from this study are preliminary, they point toward a number of changes that can enhance the care of black patients. These changes pertain to dermatology residency training and workforce.

Given the importance of dermatology provider interaction style on participants' satisfaction with care, the emphasis on culturally aware communication skills training should be widened. Similarly, participants' perceptions that non-SOCC dermatologists lacked specific knowledge for black skin and hair indicates increased education in the treatment of skin of color is warranted. A number of dermatology training programs have initiated such curriculum, and they are encouraged to be emulated. The perceptions of racial and cost-of-care insensitivities identified by study participants suggest that training in cultural competency and implicit bias, as well as social determinants of health and delivery of cost-conscious care,[23] respectively, may be of benefit.

Considering the apparent importance of shared life experiences, the voices of the participants in this study provide additional evidence that a change is needed in the dermatology workforce.[1,2] An increase in the number of black dermatologists should materially improve the quality of care received by black patients.

This study's findings need further validation through a deductive research design involving a larger, representative sample of black patients. Research should also focus on evaluating the above mentioned changes in the process of dermatology residency training. It should examine the dermatology experience of other groups of people of color to determine specific factors influencing their care satisfaction. Methods to increase diversity in the dermatology workforce should also be assessed.

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Study concept and design: All authors.
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Drafting of the manuscript: Gorbatenko-Roth, Prose, Patterson.
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