

Dark Skin Colorism vis-à-vis Telomere Vigor: An African-American Chromosomal Theory of Ageing

Ronald E Hall*

**School of Social Work, Michigan State University, USA.*

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ABSTRACT

As pertains to ageing, whiteness remains consistent via proximity to light skin. According to empirical evidence, absent light skin is designation of an inferior race that has imposed psychological “scars” upon African-Americans associated with their darker skin. This skin color divide postulated the foundation for a tenacious source of stress brought by wholesale discrimination against dark-skinned African-Americans known as dark skin colorism. DSC operates similar to the stresses of racism. It is a critical stress regardless of racial background and not irrelevant to African-American ageing per telomere vigor. At the chromosomal level, it is then apparent that stress is pathological to the vigor of telomeres, which accelerates the ageing process. Succinctly put the stresses of colorism may reduce telomere length thereby exposing chromosomes to the ravages of chronic diseases. Exposure to these chronic diseases may precipitate longevity differentials between African- and Euro-Americans as prerequisite to a chromosomal theory of ageing.

Keywords: Dark skin, Colorism, Telomere, African-American

INTRODUCTION

In 1967, a Dutch social scientist named Harry Hoetink introduced the concept of “somatic norm image” [1]. His objective in its introduction was to provide an explanation for the existing segregation in local Caribbean societies. Succinctly put somatic norm image according to Hoetink [2] pertains to “the complex physical (somatic) characteristics which are accepted by a group as its norm and ideal” (p. 120). Precisely Hoetink [2] contends that skin color is a significant factor of distinction per said ideal in such locations as the Hispanic Caribbean and Latin America upon which local segregation is contingent. Although he did not assume it at the time, skin color is herein suggested as a ubiquitous source of stress brought by its implied social status. This assumption challenges the rigidity of racial constructs validated and owed to the academies in such countries as those in Europe and the non-Hispanic Americas. Therefore, a Euro-American, i.e.: white citizen in one country, may ultimately be assessed as African-American, i.e.: black in another country dependent upon their degree of skin color producing melanin. However, the idealization of whiteness remains consistent via proximity to whiteness defined by light skin [3]. In the aftermath, those who are characterized by dark skin having significant melanin content are stigmatized and designated as descended from an inferior race category regardless of their genealogy or racial heritage.

Designation as descended from an inferior race category is not without quality of life and/or health consequences. In 1951, two psychiatrists named Abram Kardiner and Lionel Ovesey published their now classic work: The Mark of Oppression. Their primary thesis is that a designation of inferior race has imposed psychological “scars” upon African-Americans associated with their darker skin. These scars are manifest among otherwise sane dark-skinned African-Americans commensurate with a clinically disturbed comparable light-skinned Euro-American population. However, the origins of psychopathology for the two groups differ. For Euro-Americans, their psychopathology is derived from established, personal pathogens. For African-Americans characterized by dark skin their pathology is derived from adaptation to a pathogenic environment having nothing whatsoever to do with them personally. Therefore, the origin of Euro-American pathology is internal to the victim compared to that of African-Americans where it is external. Subsequently, African-Americans as victims are

Corresponding author: Ronald E Hall, School of Social Work, Michigan State University, 224 Baker Hall, East Lansing, MI 48824, USA, Tel: 517 432 3729, E-mail: hallr@msu.edu

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less culpable for their psychopathology compared to their Euro-American counterparts. This African-American adaptation to a societal ill according to Kardiner and Ovesey is then tantamount to a basic personality typology. Said typology is indicative of the entire group regardless of class, intelligence or other demographic circumstances carried throughout the lifespan [4]. The extent of the pathology may be determined by intra-race complexion relative to melanin content. Consequently, the result is a quality of life in ageing imposition, which Kardiner and Ovesey assessed in a psychological context. Their conclusions were thus, limited by the omission of reference to ageing at the most basic genetic level of vigor in the human telomere [5].

The social origins of African-American physical ailments attributable to societal ills have heretofore remained stealth and aloof from the agendas of academy personnel. Telomeres until recently were dismissed as culpable to ageing or any associations with adaptation to societal ills. The origin of the term “telomere” derives from the Greek “telos” meaning “end” and “meros” meaning “part” [6]. The particular end parts are cap-like structures, which preserve the health of chromosomes. A chromosome is a microscopic linear biological form that contains human genetic information not irrelevant to the ageing process [7]. Telomere vigor is then critical to human health and human quality of life and thus essential to chromosomal function. Absent functional telomeres, chromosomes may become dysfunctional and thereby lose their ability to carry out essential genetic biological tasks that may accelerate the ageing process especially that of African-Americans [8].

In consideration of telomere vigor in function per the ageing process, the objective of this paper is to inform various sectors of the social science academy including Psychology, Sociology and Social Work. It aims to illuminate the significance of skin color in lieu of race where race has dominated the social science academy pertaining to African-American quality of life and societal social status. By documenting the social implications of dark skin for African-American biological function, a new perspective of the ageing process will become apparent. Skin color unlike race is mathematically quantifiable hence ideally given to the more objective and rigorous scientific method. Reference to skin color will rationally dismiss the subjective, less rigorous scientific conclusions of race organized relative to the following: (a) somatic norm image; (b) dark skin colorism; and (c) African-American ageing per telomere vigor.

SOMATIC NORM IMAGE

Being author of the somatic norm image Harry Hoetink began his career as a historian-teacher and by his Dutch ancestry was originally from Holland [9]. Most of Hoetink's research focus prevailed in the Caribbean where he commenced to observance of natives influenced by the British, French, Dutch and Spanish colonials. After

numerous observations, Hoetink devised the somatic norm image hypothesis. His initial intent was to explain the existence of dark-skinned women who internalized alien light skin as an idealized standard of feminine beauty [10].

Light skin by dark-skinned native women was idealized as the somatic norm image beyond the prescriptions of feminine beauty. It also impacted native class divisions. Subsequently in Western colonies, Hoetink found that the ideal of light skin defined the intermediate class among the natives exported from the light skin somatic colonial ideal. Thus, any native who was European in appearance by light skin was treated as white in proximity to the white somatic norm image. Those characterized by dark skin were scorned as black being a contrast to light skin. In pondering this observation, Hoetink concluded a fundamental hypothesis in that a native may be regarded as white in the Dominican Republic and as “colored” in Jamaica, as per a colonial based somatic norm image. Additionally, the same native may be assessed as a “Negro” or a Black person in Alabama by reference to the historical social evolution of light skin in the American South [11]. Both instances are a significant source of debilitating stress [12].

Hoetink's somatic norm image is not without criticisms. It evidences some inconsistency in the particular colonial influences brought by differentiations between the British, French, Dutch and Spanish. However, despite such differences, there remains a fundamental premise, that the colonial somatic norm image is idealized by the dark-skinned natives as well as their light-skinned oppressors. Native children then learn during their youth that light skin is the preferred standard pertaining to all quality of life measures to which they must adhere for any hope of success no less apparent for African-Americans in the US [13].

The idealization of light skin per somatic norm image in the Caribbean meant that it became a vehicle for status among African-Americans despite the fact that it was a less common trait [14]. Value-laden terms evolved in the U.S. that reflected light skin as the colonial somatic norm image including “high-yellow, ginger, cream-colored, and bronze” [15]. Similar traits associated with the somatic norm included hair, which was designated as “bad” if it was by dark skin the kinky African type and “good” if it was by light skin the straight Caucasian type. Ultimately, among African-Americans reference to any feature of light skin more often inferred something desirable or celebrated as the desired somatic ideal [16].

Once light skin prevailed as the somatic norm image in the U.S. it evolved in the works of light-skinned African-American intellectuals like W.E.B. DuBois. DuBois is credited with founding of the “Talented Tenth.” The Talented Tenth were considered the African-American ideal and their mention first appeared per a DuBois article titled: The Negro Problem in 1903. The Negro Problem was an

essay, which advocated access to higher education for African-Americans.

DuBois was in conflict with another light-skinned African-American intellectual named Booker T Washington. Washington believed that African-Americans should accept their inferior status until such time they could ascend by approval of the slave-owning plantation class. DuBois retorted that: “to attempt to establish any sort of a system of common and industrial school training, without first providing for the higher training of the very best teachers, is simply throwing your money at the winds.” Thus, DuBois believed that African-Americans deserved of advancement would require access to a classical education if they were to realize their racial potential. According to DuBois: African-Americans, like all races, is going to be saved by its exceptional aspirants. The problem of education, then among them must first of all deal with the Talented Tenth. The Talented Tenth pertains to developing the best and brightest that they may guide the masses. Relative to the somatic norm image and without direct accusation, the Talented Tenth were dominated by the middle classes of mixed-race, light-skinned “Negroes.” Many, like Washington and DuBois, had been fathered by members of the antebellum, slave-owning, plantation classes [18]. This unspoken skin color divide provided the foundation for a tenacious source of stress brought by the wholesale discrimination against dark-skinned African-Americans known today as dark skin colorism.

DARK SKIN COLORISM

As pertains to dark skin colorism (DSC), race is subjugated in consideration of a social transgression extended from vestiges of the somatic norm image. DSC operates identical in function to racism per social transgression but in fact is distinct. Colorism is a term first coined by noted [19]. Manifestations of colorism are acted-out measuring the human worth of light-skinned and dark-skinned populations where dark skin is assumed indicative of inferior race evolutionary status [20]. Said status can be assessed relative to the stereotypes of dark-skinned populations in their dress, their cultural practices, their physical attractiveness and their reduced marital potential. Those who are light-skinned in proximity to the Euro-American ideal are alleged to be of superior stock pertaining to the aforementioned requisites.

Initially colorism was intended by Walker [21] for application to the African-American community exclusively where complexion has existed as a factor of determining social condition since the infamous era of the antebellum. Nevertheless, recent trends in third-world immigration to Western destinations such as the U.S. and Europe, and the resulting population diversity of these destinations have required a more extensive application of colorism, i.e.: DSC. The racial contributions made by those of Asian, Latino, African and mixed-race descent has resulted in an unprecedented range of skin color variations from the very

light-skinned to the very dark-skinned. The subjugation of “inferior” race populations supersedes race extending to skin color. Therefore, various sectors of the social science academy have attempted empirical verification of racial inferiority implied by dark skin [22]. Absent objective scientific rigor dark-skinned populations under the circumstances of DSC are ultimately deemed inferior carried out during social interactions involving dark-skinned and light-skinned individuals regardless of race, ethnicity or cultural category. It is a stressful manifestation dramatically displayed in the perpetuation of brown racism.

Brown racism is a peculiar form of DSC. It is a socio-cultural colonial event carried out by the victims of a previous colonial world order [23]. Brown racism is a most dramatic illustration of the race world order in white supremacy perpetrated by non-Caucasoid immigrants colonized, conquered or otherwise dominated who travel and settle in Western sovereignties including the U.S. Its author is sociologist Washington [23]. According Washington [23], brown racism is evident among lighter-skinned Mestizos, Chinese, Filipinos and South Asians. It is considered a variation of white racism via supremacy that probably occurred as a result of historical confrontation with Caucasian race Europeans and ultimately European domination. These Mongoloid race populations some of whom are among the darkest in skin color then discriminate against similarly dark-skinned Negroid race populations and any others noted by dark skin including members of their own group. Light skin as race proxy allows for DSC evident in the course exchanges between light- and dark-skinned leadership figures of the same ethnic group.

Consistently the light-skinned offspring of the plantation class perpetuated DSC aimed at their ethnic counter parts [24]. Wealth, poise and overall appeal were denied by DSC in the absence of light skin [25]. Considerable tension arose from this obvious distinction, which relegated the most esteemed members of the African-American community much below their social status. Among the more intense of such exchanges is the verbal interaction between the light-skinned DuBois and the dark-skinned Garvey. In an editorial of DuBois’ *Crisis*, an Atlanta University/NAACP journal, DuBois was said to have labeled Marcus Garvey “fat, black, and ugly.” Given to DSC DuBois then suggested that dark skin and associated features were undesirable [26]. This exchange between the two was not a singular incident. A high-ranking member of the National Association for the Advancement of Colored People (NAACP) made demeaning references to Garvey as a “Jamaican Negro of unmixed stock” meaning his pronounced African features and dark skin were an impediment by inferiority [27].

DSC was also manifested economically. The highest rates of income earned by African-Americans are normally a compensation product of high status occupations. According to an investigation conducted by social scientists [28], 29%

of Euro-Americans are employed in high status occupations. A mere 15% of African-Americans are similarly employed. Relative to DSC considering African-Americans exclusively, 27% of those who are light-skinned compared to 15% who are dark-skinned are similarly employed in high status occupations [28]. Subsequently DSC is a critical quality of life stress regardless of racial background and not irrelevant to African-American ageing per telomere vigor.

AFRICAN-AMERICAN AGEING PER TELOMERE VIGOR

The results of Euro- and African-American longevity disparities characterize a reduction in telomere vigor among African-Americans noted in documented descriptive statistical data (**Table 1**).

Table 1. American life expectancy.

Year	All races			White			Black		
	Both sexes	Male	Female	Both sexes	Male	Female	Both sexes	Male	Female
2010	78.7	76.2	81.1	79.0	76.5	81.3	75.1	71.8	78.0
2000	77.0	74.3	79.7	77.6	74.9	80.1	71.9	68.3	75.2
1990	75.4	71.8	78.8	76.1	72.7	79.4	69.1	64.5	73.6
1980	73.7	70.0	77.4	74.4	70.7	78.1	68.1	63.8	72.5
1970	70.8	67.1	74.7	71.7	68.0	75.6	64.1	60.0	68.3
1960	69.7	66.6	73.1	70.6	67.4	74.1	—	—	—
1950	68.2	65.6	71.1	69.1	66.5	72.2	—	—	—
1940	62.9	60.8	65.2	64.2	62.1	66.6	—	—	—
1930	59.7	58.1	61.6	61.4	59.7	63.5	48.1	47.3	49.2

(—) Data not available [29]

Since 1930, the life expectancy of Americans has improved but that of African-Americans (Black) has lagged behind that of Euro-Americans (White). By 2010, that differential remains significant where all races per both sexes was 78.7 years; all races per males were 76.2 years; all races per female were 81.1 years. Life expectancy for White per both sexes was 79.0 years; White per male was 76.5 years; White per female was 81.3 years. Life expectancy for Black per both sexes was 75.1 years; per male 71.8 years; per female 78.0 years. While the aforementioned 2010 Black/White expectancy gap is significantly reduced compared to 1930, it remains significant to ageing in the current era.

Telomere research conducted in 2014 by investigators Chae et al. [30] addressed the prospects of ageing in reference to African-American longevity. The rationale for Chae et al. [30] study is grounded in leukocyte telomere length (LTL). As per the aforementioned introduction, telomeres extend from DNA located at the ends of chromosomes for purposes of their preservation measured in length [30]. When associated with the appropriate proteins, vigorous telomeres slow the breakdown of coding regions of DNA. When LTL is assessed by length, it may provide a clue to DSC and longevity relative to the African-American ageing process. Subsequently, the shorter the LTL induced by the stress of DSC the more likely the onset of life threatening chronic ailments that accelerates ageing.

Relative to ageing, evidence suggests that stress is a critical factor in telomere length and hence associated with the cause of death. As defined in medicine stress pertains to a medical or biological condition. It is associated with physical, mental and emotional factors that manifests in mental tension. The origin of stress may be external as pertains to the environment, victim psychology or their social circumstances. Stress may also originate externally as pertains to an illness or medical procedure. By physiological impact, stress may facilitate a “fight or flight” response tantamount to a complex reaction of neurologic and endocrinologic systems [31,32]. Most importantly, stress is known to reduce telomere length and hence its vigor associated with premature death in the prospects of ageing.

Using a rigorous scientific methodology, aforementioned investigators suggest the existence of DSC stress when there is conflict with the somatic norm image. As opposed to groundless accusations by members of the academy in “playing the race card” African-American men suffer a decrease in longevity as prerequisite to acceleration of the ageing process. Subjects who co-operated Chae et al. [30] investigation were African-American males from a community sample of 92 participants between the ages of 30 and 50 years old. Participating males were recruited during February 2010 to May 2010. For purposes of statistical measures, ordinary least squares regressions were calculated.

This process facilitated the examination of LTL in kilobase pairs as per DSC. The researchers' investigation was statistically significant for measures of LTL ($b = 0.10$, $SE = 0.04$, $p = 0.02$). Participants who evidenced DSC commensurate with higher levels of DSC stress had the shortest LTL. SES threshold ratio was additionally commensurate with LTL ($b = 0.05$, $SE = 0.02$, $p = 0.01$). In the aftermath, it is plausible that the ageing process among African-Americans under stress, i.e.: dark-skinned is accelerated by DSC [30]. Social science investigators contend that by isolating factors such as stress pertaining to shorter LTLs may provide an explanation for racial disparities between Euro- and African-American longevity relative to ageing.

Racism as a proxy for DSD is stressful and directly impacts telomere vigor by length. According to the American Psychological Association, a greater number of Americans report an increase in stress than in years past. Subsequently 39% contend that over the past year their stress had increased. What's more, in the past five years 44% report an increase. In excess of 50% of Americans reported personal issues as a source of stress, which was an increase from 47% in 2009. About 26% of Americans contend they are doing an excellent or very good job of eliminating personal stress. When stress does occur, a mere 29% profess to doing an excellent or very good job of managing or reducing it.

Most American adults by 83% are convinced that stress can have a strong or very strong impact upon their health. An impressive 94% of Americans agree that stress can be a major factor in the onset of disease including heart disease, depression and obesity. Furthermore, they contend that stress may also manifest in heart attacks, arrhythmias and sudden death, particularly where victims have been diagnosed with the addition of cardiovascular disease (92%) [33]. conclusively, stress may extend from societal origins and manifest in physiological ailments that impose upon ageing longevity among Americans exacerbated among African-Americans. DSC is one such stress that reduces African-American telomere vigor and hence accelerates the ageing process leading to decreased African-American longevity compared to Euro-Americans. In the aftermath, is a critical rationale for the validation of an African-American chromosomal theory of ageing.

CONCLUSION

The somatic norm image existed long before Hoetink's designated nomenclature introduced it into the general public domain [34]. It was acted out in the well-known prospects of colorism. However, colorism is a public taboo and as such leaving it less amenable in references external to the native group, i.e.: exclusive to people of color including African-Americans. Additionally, Eurocentric hegemony of the academy further served as impediment to the exposition of colorism issues, which all but served the ageing disparities between African- and Euro-Americans when

surveyed [35]. Hence, overlooking empirical evidence, race was sustained as the primary culprit in African- and Euro-American ageing disparities. This inability to locate the source of African- and Euro-American ageing disparities has contributed to an unnecessary and tenacious acceleration of the African-American ageing process.

To access the evidence for ageing disparities at its source will require consideration of colorism via DSC. DSC was investigated per chromosomal theory of ageing by an examination of African-Americans nationally over the age of 25 years. Substantiated by research evidence the four most common causes of African-American deaths include heart disease, cancer, stroke and diabetes. The empirical results suggest that colorism manifested as racism causes a proliferation in African-American mortality rates. Investigators have surmised that in locations where Google searches for the n-word was one standard deviation above the mean there was an 8.2% increase in mortality rates for local African-Americans. The same search was associated with increases in cancer, heart disease, and stroke. These findings investigators contend account for more than 30,000 (premature) deaths annually among African-Americans nationwide. Furthermore, when investigators controlled for demographics and socioeconomic, the extent of the impact decreased from 8.2% to 5.7%. However, investigators contend that these "are also influenced by racial prejudice and discrimination and therefore could be on the causal pathway." Succinctly stated "it's NOT racism that's making up that 2.5% difference. Directly and indirectly, racism kills" [36].

The mortality potency of racism by colorism is a product of stress [37]. DSC serves as cue to the dark-skinned victims of colorism stress irrelevant to Euro-Americans and/or their lighter-skinned counterparts. At the chromosomal level, it is apparent that stress is pathological to the vigor of telomeres. Succinctly put stress may reduce telomere length thereby exposing chromosomes to the ravages of chronic disease including heart disease, cancer, stroke, and diabetes. Susceptibility to these diseases among African-Americans is brought by an accelerated ageing process. Accelerated ageing may occur due to reductions in telomere length status that impairs the victim's ability to ward-off chronic disease [38]. The indisputable conclusion serves as introduction to a heretofore, unprecedented African-American chromosomal theory of ageing.

Colorism, as pertains to DSC and dark-skinned refugees/immigrants who reside or migrate to Western nations carry the vestiges of colonial domination. The ability of Western social scientists to accurately perceive, conceptualize, and interact with dark-skinned populations is a necessity in a rapidly changing and complex world. Since many Americans, evidence perspectives attributed to cultural technologies derived from cultural legacies, a singular worldview cannot and must not be allowed to prevail.

Subsequently, social scientists without fearing prejudice must increase their knowledge base considerably and consistently as per DSC and the African-American ageing issue. Furthermore, at a time of increased international contacts, social scientists are confronted by issues such as skin color and perspectives on dark skin that did not require their intellectual consideration in the past [39]. Subsequently social scientists' continuing search for knowledge must remain constant and viable to sustain the integrity and prestige of the social science academy. Only then can it effectively address the significance of telomere vigor such that the ageing disparities between African- and Euro-Americans can be essentially resolved.

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