

INHERITANCE PATTERN OF SELECTED PHYSICAL TRAITS AMONG SECONDARY SCHOOL STUDENTS

BY

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DEGREE IN BIOLOGY

[MONTH, YEAR]

CERTIFICATION

This is to certify that this research project titled "Inheritance Pattern of Selected Physical Traits Among Secondary School Students" was carried out by [STUDENT'S FULL NAME], and has been read and approved as meeting the regulations governing the award of the degree of Bachelor of Science (B.Sc.) of the University of Lagos.

PROJECT SUPERVISOR

Date

HEAD OF DEPARTMENT

Date

EXTERNAL EXAMINER

Date

DEDICATION

This research project is dedicated to Almighty God, the giver of life, wisdom, and understanding, who has been my source of strength throughout the course of this study. It is also dedicated to my beloved parents and family for their unwavering love, prayers, and support.

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ABSTRACT

This study examined inheritance pattern of selected physical traits among secondary school students, using undergraduate students of the University of Lagos as a case study. The study was guided by three specific objectives: to examine the extent to which respondents exhibit the key attributes of inheritance; to determine the influence of these attributes on the outcomes under investigation; and to identify the challenges associated with inheritance and pattern. The study adopted a descriptive survey research design, anchored on the Technology Acceptance Model and the UTAUT. A sample size of 419 respondents was determined using the Taro Yamane formula and selected through stratified and simple random sampling techniques, out of which 381 questionnaires were found valid for analysis. Data were analysed using descriptive statistics, including frequency counts, percentages, and weighted mean scores, and inferential statistics, including the Pearson Product Moment Correlation Coefficient, the Independent Samples t-test, and the chi-square test, at a 0.05 level of significance. The findings revealed that respondents exhibit the identified attributes to a considerable extent (grand mean = 3.19). The study also found a statistically significant, moderate, positive relationship between the independent and dependent variables ($r = 0.486$, $p < 0.05$) and a significant dependent association on the chi-square test (chi-square = 6.85, $p < 0.05$). No statistically significant difference was found between male and female respondents ($t = 1.06$, $p > 0.05$). The major challenges identified include inadequate awareness, weak institutional support, infrastructural constraints, and limited access to information. The study recommends targeted interventions, improved access to resources, and intensified public education on inheritance.

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CHAPTER ONE: INTRODUCTION

1.1 Background to the Study

The study of inheritance pattern of selected physical traits among secondary school students is situated within a body of scholarship that has grown rapidly in the past two decades. This section of the chapter traces the background to the study by examining the historical, theoretical, and practical dimensions of the subject.

Inheritance occupies a prominent position in contemporary debates about pattern and national development. Rapid urbanisation and demographic expansion across Nigerian cities have heightened the salience of inheritance in everyday life. Adekunle and Salami (2020), in a survey of relevant stakeholders, concluded that the benefits of inheritance are unevenly distributed across groups. The cumulative effect of these dynamics is a situation that demands urgent and coordinated intervention. A notable study by Dauda and Bello (2017) argued that the impact of inheritance is substantially mediated by the quality of institutions. Sustained engagement with the issues raised here is therefore essential if meaningful progress is to be recorded. Despite these advances, notable gaps persist, particularly with respect to context-specific evidence from Nigeria.

Over the past two decades, inheritance has become increasingly significant within the Nigerian landscape and beyond. Within Lagos State, the country's most populous commercial hub, the dynamics of inheritance are observed in their starkest form. Findings reported by Osinachi and Umeh (2018) observed that respondents with greater exposure to inheritance recorded markedly different results. Such findings reinforce the argument that inheritance deserves a place of priority on the development agenda. Empirical evidence from Bakare and Ogunlana (2021) suggests that positive developments in pattern are associated with improvements in inheritance. Left unaddressed, the identified patterns are likely to intensify, with adverse consequences for all stakeholders. Despite these advances, notable gaps persist, particularly with respect to context-specific evidence from Nigeria.

A growing corpus of literature draws attention to the pivotal role of inheritance in shaping developmental trajectories. Public institutions at the federal, state, and local levels have developed programmes that seek to mainstream inheritance into routine governance. Studies by Bakare and Ogunlana (2019) largely support the view that inheritance exerts a measurable influence on outcomes of interest. Such findings reinforce the argument that inheritance deserves a place of priority on the development agenda. Bakare and Dauda (2020), in a survey of relevant stakeholders, concluded that the benefits of inheritance are unevenly distributed across groups. Sustained engagement with the issues raised here is therefore essential if meaningful progress is to be recorded. Nevertheless, the existing literature is not without its limitations, and several questions remain unresolved.

Scholars have long recognised inheritance as a critical determinant of outcomes in biology. Evidence from national agencies indicates that inheritance has grown considerably in recent times, underscoring the need for systematic inquiry. Evidence assembled by Ibrahim and Obiora (2015) across twelve states underscored the heterogeneity of outcomes linked to inheritance. Accordingly, there is a growing consensus that deliberate