The Population Census' Conundrum:
A Critical Analysis of the 2022 Population and Housing Census in Liberia

Teakon J. WILLIAMS, DBA, PMP
Institute for Sustainable Development, School of Global Affairs,
Cuttington University, Monrovia, Liberia

Abstract:- An effective and efficient population census process, with reliable and valid data, iscritical for national development planning and project implementation. However, many experts in Liberia are skeptical of the reliability and validity of the results from the 2022 National Population and Housing Census given deviations from basicstandards and procedures whenconducting census. Most of the concerns stem from preliminary census results for counties that donot tally with existing validated health and other socio-economic data that would engender high population growth. To mitigate this situation, some sectors of the Liberian society are calling for either the cancellation or the relaunch of the census in line with established global protocols and procedures. There are concerns that most of the figures were made up to meet existing simulations values (based on the population growth rate of Liberia at 3%) of international organizations. Moreover, political commentators suspectthat the census values were tweaked to give the ruling establishment unfair competitive advantage in the upcoming election season.

Keywords:- Validated data, Reliable data, Population growth rates, Unsubstantiated data, Unfair advantages.

I. INTRODUCTION

In 7 months, Liberians will be going to the poll to elect a new leader who will steer the affairs of the country from 2024 to 2029. The significance of this election is centered on (a) the desire of the current administration to continue to steer the affairs of the country after 6 years in power, and (b) the desire of a new personality to take over from the current establishment in power. The realization of either feat is so demanding that there are always accusatory comments from these two distinct sectors (ruling establishment and opposition block) to gain political relevance.

The constitution of Liberia requires the holding of a population and housing census prior every ten years to acquire relevant data on the total population and prescribe demarcation in terms of electoral voting blocks (electoral districts). The population census in Liberia, since 1962, was held every 10 years with few deviations. The first population census was held in 1962, followed by subsequent censuses in 1974, 1984, and 2008 respectively (Karweye,

2023). The variation in census from 1984 and 2008 was due to 14 years of civil unrest in Liberia from 1990 to 2004.

The most recent census in 2022, 14 years after the last census, was designed to assess the total population and guide the demarcation of electoral districts. However, implementation activities were marred by suspicions of fraud, confusion, lack of visibility. For example, Johnson (2022) stated that Liberia's 2022 census suffered series of setbacks ranging from allegation of corruption involving authorities of the Liberia Institute of Statistics and Geo-Information Services (LISGIS) as well as irregularities, poor timing, ineffectiveness, and inefficiencies. In light of these inefficiencies, lack of visibility, internal wrangling, and comments by some sections of the Liberian populace that they were not counted, the preliminary results of the census and the anomalies of census results raise doubt of credibility in many sectors of the country

II. ANALYSIS AND FINDINGS

Liberia's population has grown incrementally from year to year. Since 1962, Liberia's population has increased from 1.2 million in 1962 to 5.2 million in 2022, a 333% growth. Population increase is driven by a series of factors that includes a reduction in the death rate, an increase in the birth rate, migration, lack of family planning, and pull factors (job opportunities, educational pursuit, etc.). Mahtta et al. (2022) asserted that population growth in developing countries is mainly in urban areas that foster economic development. However, the 2022 population census in Liberia showed high population growth for counties experiencing low economic activities, limited employment opportunities, little access to health, high prices due to limited road access, little access to markets, etc. This situation brings into question the credibility of the entire Census Process.
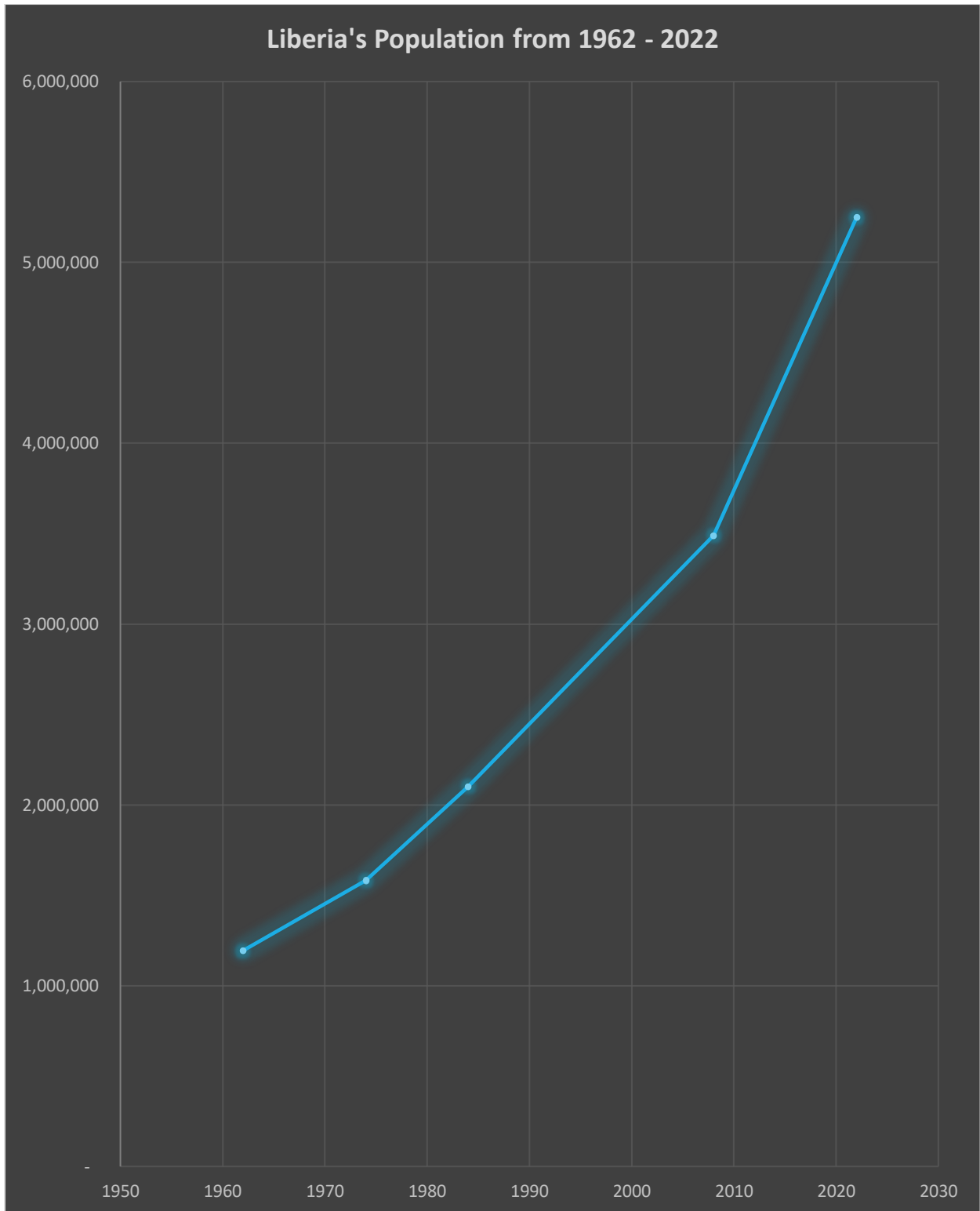
Fig. 1: Liberia's Population Trend from 1962 to 2022[1]

In light of the increased trend in the population of Libera over the years, the publication of the 2022 Population Census reflecting an increased population was never going to be a surprise. However, the correlation of values with United Nations Population Fund – UNFPA (World Population Dashboard -Liberia | United Nations Population Fund (unfpa.org), Worldometer (Liberia Population (2023) - Worldometer (worldometers.info)), Population Pyramid (Population of Liberia 2022 - PopulationPyramid.net), and World Population Review (Liberia Population 2023 (Live) (worldpopulationreview.com)) all at 5.3 million (compared to 5.2 million from LISGIS), leaves one to wonder whether survey personnel did not simulate the new population data based on the population growth rate (as opposed to actual counting) by LISGIS. Table 1 displayed a simple simulation of the population value from 2008 to 2022 at a 3% population growth rate. The LISGIS preliminary results showed that the population growth rate is now 3% (LISGIS, 2023).

Year	Annual Growth Rate	Total Population
At 3% you get		
2008		**3,489,072**
2009	104,672.16	3,593,744.16
2010	107,812.32	3,701,556.48
2011	111,046.69	3,812,603.18
2012	114,378.10	3,926,981.27
2013	117,809.44	4,044,790.71
2014	121,343.72	4,166,134.43
2015	124,984.03	4,291,118.47
2016	128,733.55	4,419,852.02
2017	132,595.56	4,552,447.58
2018	136,573.43	4,689,021.01
2019	140,670.63	4,829,691.64
2020	144,890.75	4,974,582.39
2021	149,237.47	5,123,819.86
2022	153,714.60	**5,277,534.46**

Table 1: Population Growth Rate Simulation at 3%

The total population for 2022 as depicted in Table 1, is similar to those provided by LISGIS. A critical analysis of population variance of the 15 counties of three different censuses (1984, 2008, and 2022) shows some anomalies in value in some counties. Before delving into details, figure 2, displayed a graphical representation of population trends per county over the three censuses.
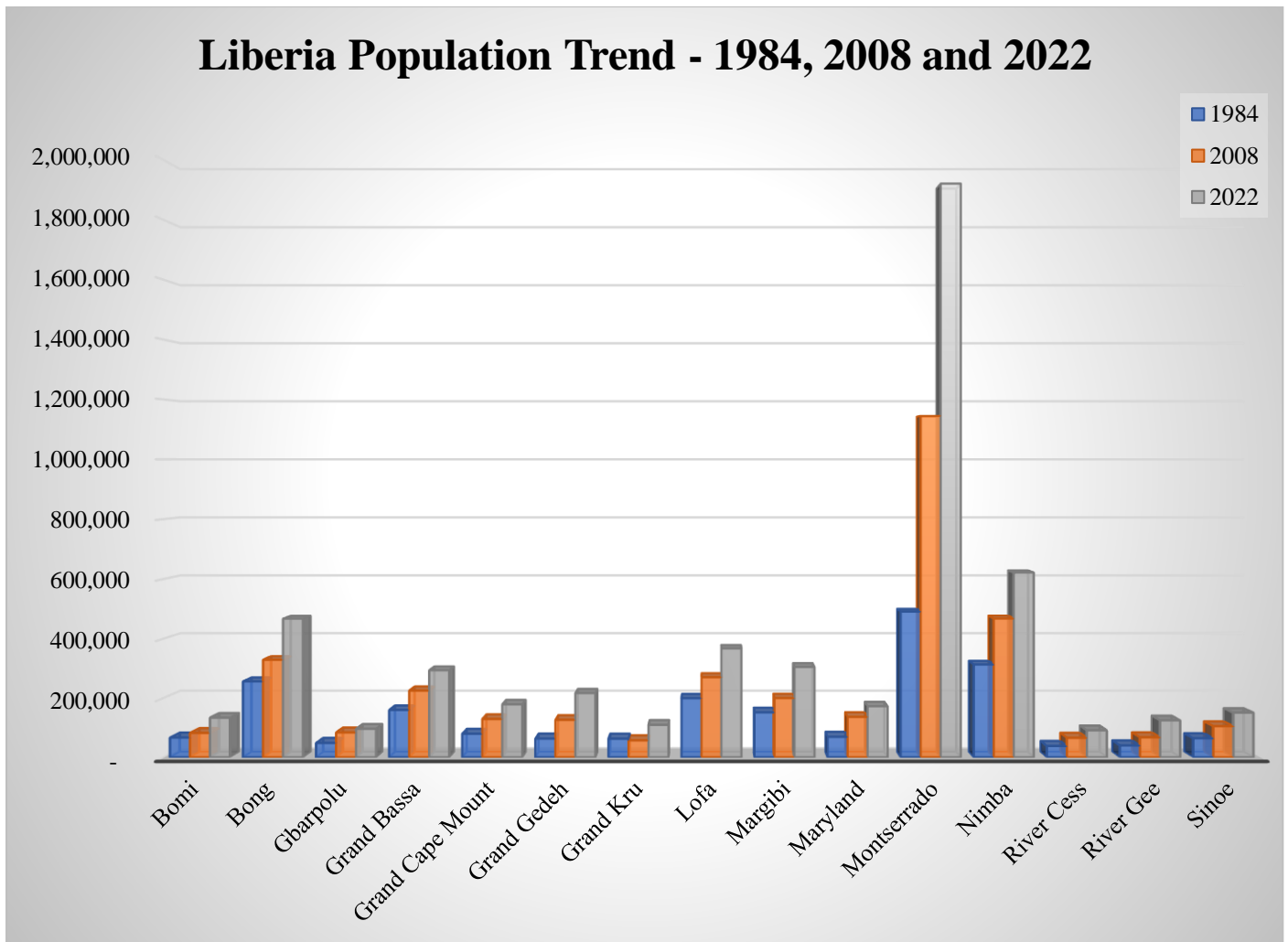
Fig. 2: Liberia's Population Trend – 1984, 2008, and 2022

An analysis of variance showed a steady trend among Grand Bassa, Grand Cape Mount, Nimba, Rivercess, and Sinoe. However, the rapid increase in population for Bomi, Bong, Grand Gedeh, Grand Kru, Margibi, and River Gee is unprecedented and calls for serious concern. What are the pull factors that drove this rapid increase? A critical look at these counties showed that these counties experienced high absolute poverty, food poverty, and extreme poverty (MFDP, 2018). These indicators are all push factors adverse to high population growth. Moreover, most of these counties (Grand Gedeh, River Gee, and Grand Kru) as part of the southeastern region of Liberia, are the highest users of contraceptives at 22% (LDHS, 2013). The mere fact that the reported counties with the least opportunities for migration, with little attraction for domicile, and with the highest use of contraceptives, will attract high population growth creates room for more questioning of the process.

LISGIS needs to explain this variation in these numbers and the factors that inform the result. Data are not conflicted; they speak to each other. The report on contraceptive use, for example, is not speaking to the result provided by the LISGIS. Figure 3 further depicts a population change comparison from 1984 to 2008 (24 years) and 2008 to 2022 (14 years).
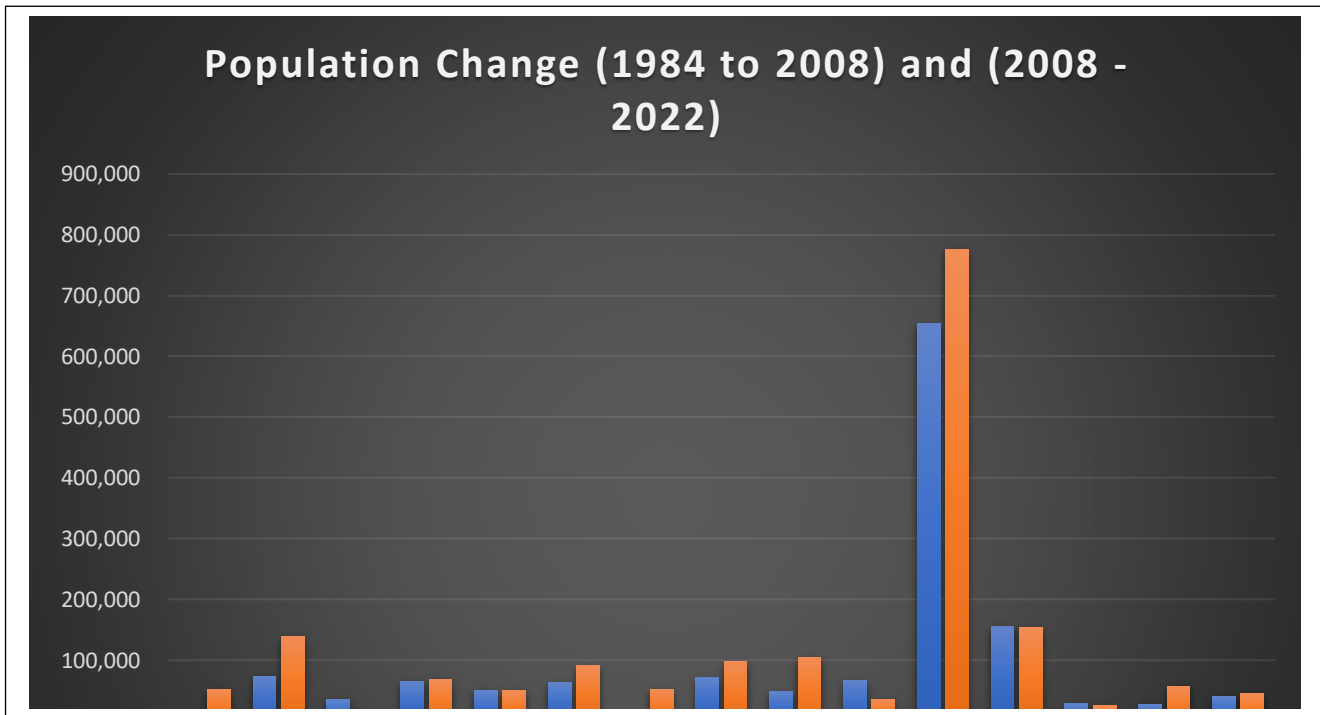
Fig. 3: Population Change (1984 to 2008) and (2008 – 2022)

Bomi County's population increase was 15,616 between 1984 and 2008 and 51,632 between 2008 and 2022 indicating a 70% increase from the two periods. Bomi's multi-dimensional poverty index value of 79.1 is above the national average of 71.2% (MFDP, 2018). This figure connotes that almost 80% of the people of Bomi are multi-dimensionally poor and deprived of basic necessities. Similarly, in Grand Kru, in which the population from 1984 to 2008decreased by5,685 (indicating negative population growth), there was a dramatic increase in population by 52,236 (91%) from 2008 to 2022. Grand Kru County is considered one of the most deprived and poverty-ridden county in Liberia at 90.6% (incidence of multi-dimensional poverty) (MFDP, 2018). The analysis is the same with Grand Gedeh and andRiver Gee which increased by 30% and 52% respectively despite incidence of multidimensional poverty of 74.9% and 81.4% respectively (MFDP, 2018).

Conversely, Montserrado, Nimba, and Lofa counties, with many pull factors (agriculture activities, mining activities, better road access, access to jobs, etc.) showed marginal increases between 1984 and 2008 and 2008 to 2022. For example, Montserrado had a population differential of 653,728 between 1984 and 2008 and 776,108 between 2008 and 2022 indicating an increase of 16% during that period. Moreover, the difference between the variances of the two periods (1984-2008 & 2008-2022) for Nimba is just 1,285, representing a .08% decrease from the two periods. Similarly, the difference between the two periods for Lofa is 26,390 representing a 27% increase. In a nutshell, there seems to be no correlation between counties with high pull factors and population increase. The reverse seems to be true.

III. CONCLUSION

Census information affects policies in a country-where do we build more schools, which county has more representatives, where do we build more roads, etc.? To make sound policy, decision-makers need information that is reliable and valid. Unfortunately, the preliminary census data reeks of inconsistencies. No wonder skeptics are wondering whether the data was manipulated to give certain regions competitive advantage for political reasons or data was just provided based on the UNFPA projection of the population. Even the UNFPA projection is based on the growth rate. Assuming we were just collating the data from the growth rate, the percentage distribution would not have been fluctuating and unparallel. There are queries that can be run to inform statistical data, these queries, when run, cannot validate the veracity or authenticity of the data provided by LISGIS. Statistics is not about politics. Liberia is a gullible society where academicians are seen as nothing but mediocrity is awarded. We need reliable information to make sound decisions. As it stands, there are valid reasons to question the preliminary findings.

REFERENCES

[1.] Johnson, O. (2022). Liberia: Results of 2022 Population Census at risk as enumerators expressed disenchantments. Front Page Africa.
[2.] Liberia: Results of 2022 Population Census At Risk As Enumerators Express Disenchantments - allAfrica.com
[3.] Karweye, S. (2023). Liberia's 2023 census: A recipe for vote rigging in 2023. Daily Observer.
[4.] Liberia's 2022 Census: A Recipe of Vote Rigging in 2023 (liberianobserver.com)

[5.] Liberia Demographic Health Survey (LDHS) (2013). LDHS 2013 .pdf

[6.] Liberia Institute of Statistics and Geo-Information Services (LISGIS) (2022). 2022 national population and housing census. LISGIS OFFICIAL

[7.] Liberia Population 2023 (Live) (worldpopulationreview.com)

[8.] Liberia Population (2023) - Worldometer (worldometers.info)

[9.] Mahtta, R., Fragkias, M., Güneralp, B., Mahendra, A., Reba, M., Wentz, E. & Seto, K. (2022). Urban land expansion: The role of population and economic growth for 300+ cities. *Nature Partner Journal (NPJ),* 2(5). https://doi.org/10.1038/s42949-022-00048-y.

[10.] Ministry of Finance and Development Planning (MFDP) (2018). Pro-Poor Agenda for Prosperity and Development.

[11.] Pro-Poor Agenda for Prosperity and Development(PAPD) (mfdp.gov.lr)

[12.] PopulationPyramid.net (1950-2100). Liberia Population 1962.

[13.] Population of Liberia 1962 - PopulationPyramid.net

[14.] UNFPA (2022). World population dashboard: Liberia.

[15.] World Population Dashboard -Liberia | United Nations Population Fund (unfpa.org)

[16.] World Population Dashboard -Liberia | United Nations Population Fund (unfpa.org)

APPENDIX

Population Summary per County – 1962, 1974, 1984, 2008 and 2022						
County	**1962**	**1974**	**1984**	**1984 - 2008 diff (24 years)**	**2008**	**2008 - 2022 diff (14 years)**	**2022**
Bomi	150000	-	66,420	15,616	82,036	51,632	133,668
Bong	340000	199219	255,813	73,106	328,919	138,583	467,502
Gbarpolu		-	48,399	35,359	83,758	12,237	95,995
Grand Bassa	113562	154931	159,648	65,191	224,839	68,718	293,557
Grand Cape Mount	29000	58457	79,322	49,733	129,055	49,743	178,798
Grand Gedeh		74354	63,028	63,118	126,146	90,546	216,692
Grand Kru		-	62,791	-5,685	57,106	52,236	109,342
Lofa		186201	199,242	70,872	270,114	97,262	367,376
Margibi		-	151,792	47,897	199,689	105,257	304,946
Maryland	71000	104041	69,267	67,137	136,404	35,798	172,202
Montserrado	215361	464038	491,078	653,728	1,144,806	776,108	1,920,914
Nimba		254866	313,050	155,038	468,088	153,753	621,841
River Cess		-	37,849	28,013	65,862	24,915	90,777
River Gee	57000	-	39,782	27,536	67,318	57,335	124,653
Sinoe	50000	58173	64,147	40,785	104,932	45,426	150,358
TOTAL	**1,025,923**	**1,554,280**	**2,101,628**		**3,489,072**		**5,248,621**

Represents Western Region
Represents Central Region
Represents Eastern Region

Table 2: Liberia Population and Housing Census: 1962, 1974, 1984, 2008 and 2022