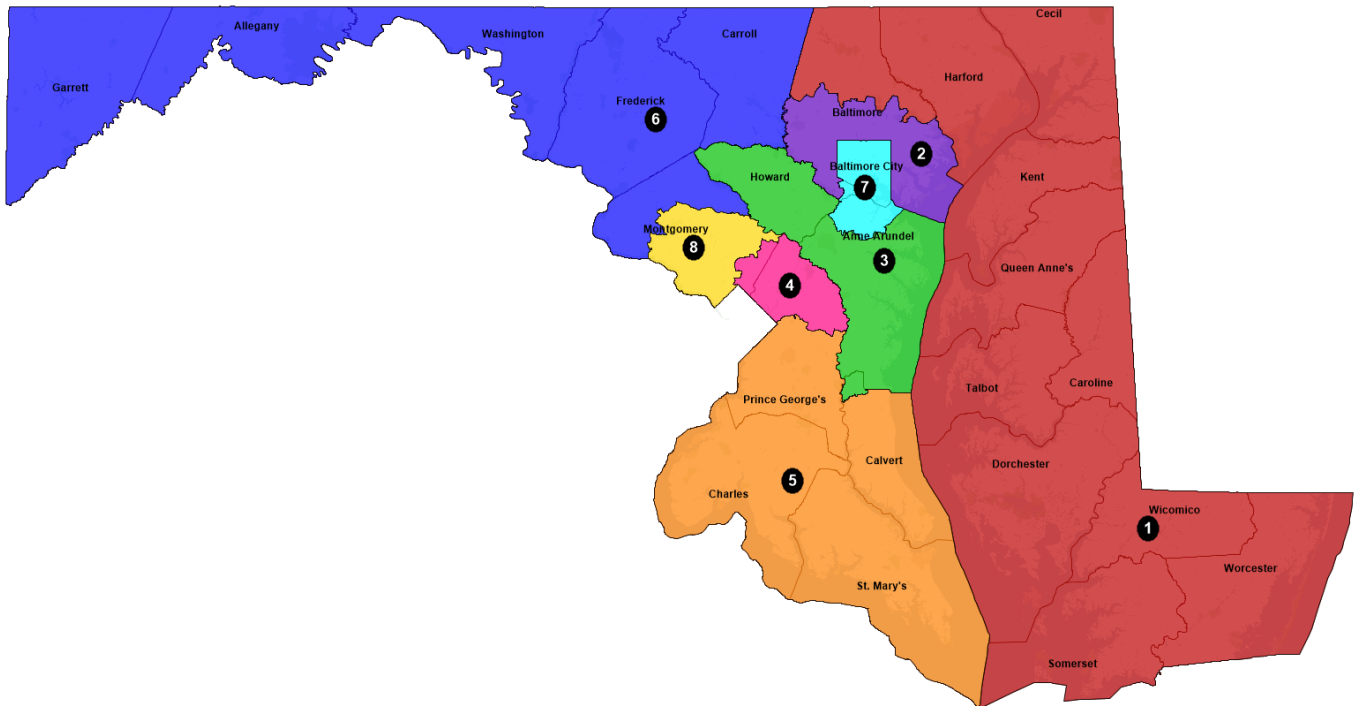


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**Bill No:** HB0002/SB0002  
**Committees:** Senate Reapportionment and Redistricting Committee  
House Rules and Executive Nominations Committee

**Testimony from:** Nathaniel Persily, Ph.D.  
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<sup>1</sup> Affiliation for identification purposes only; appearing in personal capacity and not lobbying for or endorsing any legislation.

Chairs King and Healey, Vice-Chairs Hayes and Holmes, and Members of the Committee:

I am Nathaniel Persily, the James B. McClatchy Professor at Stanford Law School and the consultant hired to assist the Maryland Citizens Redistricting Commission (hereinafter “the Commission”). Over the past twenty years, I have assisted numerous courts and commissions throughout the nation with their redistricting processes. Most relevant for present purposes, I was appointed by the Maryland Court of Appeals, along with Karl Aro (who currently assists the Legislative Redistricting Commission), to draw a state legislative plan for Maryland following the Court’s decision in *In re Legislative Redistricting of State*, 805 A.2d 292 (Md. 2002).

My testimony today will explain how the Congressional redistricting plan proposed by the Commission complies with the applicable law and the Governor’s Executive Order 01.01.2021.02. I will also explain the principles that shaped the districts beyond those required by law.

**I. Satisfaction of the Legal Constraints on the Commission’s Congressional Redistricting Plan**

**A. Federal Law**

**1. One Person, One Vote**

Article I of the U.S. Constitution requires that congressional districts be “as nearly equal as is practicable.”<sup>2</sup> *Reynolds v. Sims*, 377 U.S. 533 (1964); *Wesberry v. Sanders*, 376 U.S. 1 (1964). Although departures from perfect population equality may be tolerated, they must be necessary to further certain legitimate redistricting principles. See *Tennant v. Jefferson County*, 567 U.S. 758 (2012), *Karcher v. Daggett*, 462 US 725 (1983). To avoid any hint of legal vulnerability, most congressional plans attempt to achieve perfect population equality. The Maryland Commission’s plan does exactly that.

According to the 2020 Census as modified by the prisoner adjustment done for redistricting purposes, the adjusted population for Maryland is 6,175,403.<sup>3</sup> Therefore, perfect equality among eight districts would require 771,925.375 people per district, or more precisely, five districts with 771,925 people and three districts with 771,926 people. The Commission’s plan does precisely that, with a deviation of no more than one person between districts.

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<sup>2</sup> This phrasing also appears in Section 1(c) of the Governor’s Executive Order (“Congressional districts shall ... [b]e equal in population to the extent practicable.”).

<sup>3</sup> The unadjusted figure was 6,177,224 people, according to the Census P.L. 94-171 datafile.

## **2. Prohibitions on Intentional Race-based Vote Dilution or Use of Race as the Predominant Factor**

The Equal Protection Clause of the Fourteenth Amendment of the U.S. Constitution limits the use of race as a criterion in drawing district lines. Mapmakers may not intentionally dilute the voting power of a racial group, *Mobile v. Bolden*, 446 U.S. 55 (1980), nor may they use race as the predominant factor in the construction of a district, unless necessary to comply with the dictates of the Voting Rights Act. *Shaw v. Reno*, 509 U.S. 630 (1993); *Virginia House of Delegates v. Bethune Hill*, 139 S. Ct. 1945 (2019).

The Commission's plan complies with Equal Protection. As will be discussed below in reference to the Voting Rights Act, the plan does not dilute the voting power of racial minorities. On the contrary, Black voters constitute a majority of the voting age population (VAP) in two districts and a near-majority in a third. Half of the districts (four of the eight) have Non-Hispanic White majorities of their voting age population, and half have voting age populations in which the majorities are not Non-Hispanic White (mirroring the population which, according to the 2020 Census is 49.9% Non-Hispanic White).

The majority-minority districts emerged, however, as a consequence of respecting political subdivision (particularly county) lines. Proposed District 7, for example, is majority Black VAP because it fully contains and respects the borders of Baltimore City, which is a majority Black city. Similarly, the other majority Black district, Proposed District 5, is a compact district in Southern Maryland with boundaries determined by the Chesapeake on the east, Washington, D.C. on the west, and an effort not to split Anne Arundel county (to the north) more than once. In short, race was not the predominant factor in the construction of any of these districts.

## **3. Section 2 of the Voting Rights Act**

Although the plan does not use race as the predominant factor in the construction of districts, it succeeds in preventing race-based vote dilution, which is prohibited under Section 2 of the Voting Rights Act (VRA), 52 U.S.C. § 10301. As mentioned above, half of the districts are majority minority, and two (almost three) are majority Black VAP. These shares are in proportion to the population, which is a factor the Supreme Court has explained is one to be weighed in favor of the legality of a plan under section 2 of the VRA. *Johnson v. DeGrandy*, 512 U.S. 997 (1994).

The plan accurately represents minority communities in Maryland. Blacks constitute 31 percent of the voting age population in Maryland. The Commission's plan has two majority-

Black VAP districts (i.e., 25 percent of districts), as well as one more that is also likely to “perform” for Black voters (meaning they have an “equal opportunity to elect their candidates of choice”). As seen in the tables below, the voting age population of Proposed District 5 is 58.4 percent Black, for Proposed District 7 it is 50.4 percent Black, and for Proposed District 4, it is 47.1 percent Black.

No other racial minority group is large enough to constitute a majority in a single member congressional district. As seen below, although Hispanics constitute 10.2 percent of the state’s voting age population, they are too dispersed to be able to be joined into a compact majority-Hispanic district (which exists as a threshold requirement for a Section 2 district, *Thornburg v. Gingles*, 478 U.S. 30 (1986); *Bartlett v. Strickland*, 556 U.S. 1 (2009)). Asian-Americans, as well, are too small a share of the state’s voting age population (7.8%) to constitute a majority in a single member district.

**Table 1. Demographic Breakdown of Proposed Congressional Districts**

District	Adjusted Population	Deviation	VAP	% NH White VAP	% Black VAP	% Asian VAP	% Hispanic VAP
1	771,925	0	608,119	75.5%	15.2%	2.8%	4.5%
2	771,926	1	603,809	52.8%	32.8%	7.1%	6.0%
3	771,925	0	593,909	60.9%	18.5%	11.8%	7.4%
4	771,925	0	596,181	21.0%	47.1%	8.2%	24.1%
5	771,926	1	598,574	30.2%	58.4%	3.5%	7.3%
6	771,926	1	604,357	76.3%	9.8%	5.3%	6.8%
7	771,925	0	612,598	35.8%	50.4%	5.4%	7.5%
8	771,925	0	597,655	46.0%	15.7%	18.6%	18.6%
TOTAL	6,175,403		4,815,202	49.9%	31.0%	7.8%	10.2%

## **B. Additional Criteria in the Governor’s Executive Order**

Beyond the requirements of federal law, Governor Hogan’s order adds other criteria that constrain available options for the congressional redistricting process. In particular, Section 1(a) of the order requires the Commission to “[r]espect natural boundaries and the geographic integrity and continuity of any municipal corporation, county, or other political subdivision to the extent practicable” and “[b]e geographically compact and include nearby areas of population to the extent practicable.” The Commission plan complies with these requirements.

### **1. Respecting Natural Boundaries and Political Subdivisions**

The Commission's Plan respects natural boundaries and the borders of political subdivision lines. Most notably, no district crosses the Chesapeake Bay: Proposed District 1 groups together all of the counties on the Eastern Shore. The plan attempts to keep counties and municipalities together to the extent consistent with one person, one vote. No municipalities, besides counties, are split in the proposed congressional plan.

The Commission's plan only splits five counties. Three of these counties – Baltimore County, Montgomery County, and Prince George's County – have total populations exceeding the limit for a congressional district so they must be split to satisfy one person, one vote. The only other counties that are split are Calvert County and Anne Arundel County. Calvert County is barely split – 92 percent of the county's population is placed in Proposed District 5, and only 8 percent in Proposed District 3. Anne Arundel is split with 74 percent of its population in Proposed District 3 and 26 percent in Proposed District 7 (in which it is added to the district completely encompassing Baltimore City). Both of these county splits are necessary to comply with the Constitution's equal population requirement. Moreover, Montgomery County and Baltimore County, each of which contains a single district wholly within its borders, are the only counties that are split more than once, again to prevent malapportionment.

## **2. Compactness**

The districts in the proposed plan are about as geographically compact as possible, while abiding by the other legal considerations. The strange shape of Maryland and some of its counties will necessarily affect the contours of any district that respects political subdivision lines. For example, placing the counties in Western Maryland together will inevitably create a long east-west district, and connecting the counties on the Eastern Shore together will create a long north-south district. Moreover, by respecting the boundary between Baltimore City and Baltimore County, Proposed District 2 wraps around Baltimore City. However, by both the mathematical measures of compactness presented in the chart below, as well as a more aesthetically grounded "eyeball test," the districts are much more compact than the districts in the existing Congressional plan for Maryland.

**Table 2. Compactness Analysis for Commission’s Proposed Congressional Districts<sup>4</sup>**

	Reock	Schwartzberg	Alternate Schwartzberg	Polsby-Popper	Population Polygon	Area/Convex Hull	Population Circle	Ehrenburg	Perimeter	Length-Width
Sum	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	1,886.45	N/A
Min	0.17	1.38	1.49	0.12	0.29	0.51	0.14	0.23	N/A	1.99
Max	0.57	2.40	2.91	0.45	0.95	0.86	0.80	0.51	N/A	98.92
Mean	0.40	1.73	1.94	0.30	0.71	0.74	0.47	0.35	N/A	19.37
Std. Dev.	0.13	0.35	0.48	0.11	0.24	0.13	0.25	0.11	N/A	32.99

District	Reock	Schwartzberg	Alternate Schwartzberg	Polsby-Popper	Population Polygon	Area/Convex Hull	Population Circle	Ehrenburg	Perimeter	Length-Width
1	0.34	1.68	1.74	0.33	0.29	0.66	0.14	0.23	462.47	25.03
2	0.38	2.05	2.32	0.19	0.53	0.68	0.37	0.24	162.95	7.28
3	0.30	1.82	2.06	0.24	0.50	0.66	0.18	0.28	205.28	1.99
4	0.48	1.48	1.63	0.38	0.91	0.86	0.67	0.49	83.91	2.14
5	0.42	1.38	1.55	0.41	0.95	0.86	0.80	0.42	249.86	10.09
6	0.17	2.40	2.91	0.12	0.72	0.51	0.31	0.26	554.37	98.92
7	0.57	1.45	1.49	0.45	0.87	0.83	0.67	0.39	67.98	4.34
8	0.52	1.58	1.78	0.31	0.87	0.83	0.65	0.51	99.63	5.20

<sup>4</sup> Caliper Mapping and Transportation Glossary, What Are Measures of Compactness?, at <https://www.caliper.com/glossary/what-are-measures-of-compactness.htm>:

- **Reock** – an area-based measure that compares each district to a circle, which is considered to be the most compact shape possible. The measure is always between 0 and 1, with 1 being the most compact.
- **Schwartzberg** – a perimeter-based measure that compares a simplified version of each district to a circle. The measure is usually greater than or equal to 1, with 1 being the most compact.
- **Alternate Schwartzberg** -- For each district, this Schwartzberg test computes the ratio of the perimeter of the district to the perimeter of a circle with the same area as the district. This measure is always greater than or equal to 1, with 1 being the most compact. The alternate Schwartzberg test computes one number for each district and the minimum, maximum, mean and standard deviation for the plan
- **Perimeter** – a test that lets you compare plans where the plan with the smallest perimeter is the most compact. The Perimeter test computes one number for the whole plan. If you are comparing several plans, the plan with the smallest total perimeter is the most compact.
- **Polsby-Popper** – a measure of the ratio of the district area to the area of a circle with the same perimeter. The measure is always between 0 and 1, with 1 being the most compact.
- **Length-Width** – computes the absolute difference between the width (east-west) and the height (north-south) of each district. A lower number indicates better length-width compactness.
- **Population Polygon** – computes the ratio of the district population to the approximate population of the convex hull of the district (minimum convex polygon which completely contains the district). The measure is always between 0 and 1, with 1 being the most compact.
- **Minimum Convex Polygon** – similar to the Population Polygon, but without regard to population within the areas. The measure is always between 0 and 1, with 1 being the most compact.
- **Population Circle** – computes the ratio of the district population to the approximate population of the minimum enclosing circle of the district. The measure is always between 0 and 1, with 1 being the most compact.
- **Ehrenburg** – computes the ratio of the largest inscribed circle divided by the area of the district. The measure is always between 0 and 1, with 1 being the most compact.

### **3. Prohibited Considerations – Partisanship and Incumbency**

Section C(1)(b) of the Governor’s Executive Order delineates factors the Commission may not consider in the construction of the redistricting plans. In particular, the Order prohibits considering “[h]ow individuals are registered to vote, how individuals voted in the past, or the political party to which individuals belong” and “[t]he domicile or residence of any individual, including an incumbent officeholder or a potential candidate for office.” The Commission’s plan abides by these restrictions and did not account for the prohibited criteria as part of the line drawing process.

## **II. Plan Description**

The legal requirements spelled out above greatly dictated the shape of the proposed districts. Once certain natural boundaries were respected and decisions were made regarding splits of the largest counties, the options for the map became quite limited.

Two initial decisions placed a “frame” around the plan. The first was the decision, flowing from the Executive Order’s requirement of respecting natural boundaries, to avoid having a district cross the Chesapeake. As a result, Proposed District 1 extends up the Eastern Shore from Somerset to Harford and enters Baltimore County from the north (as the district currently does) to achieve the requisite population to achieve equality. The second was the decision to join in Proposed District 6 the five counties (Garrett, Allegany, Washington, Frederick, and Carroll) in Western Maryland together, which grew from similar community of interest considerations. To maintain compactness, the remainder of Proposed District 6’s population comes from Montgomery County.

A third decision in this vein involved Southern Maryland. The three counties there – Charles, St. Mary’s and Calvert, or at least 92 percent of it) – were similarly considered to constitute a cohesive community. They are joined with the southern half of Prince George’s County (basically, everything south of Bowie) to form a compact district (Proposed District 5) in Southern Maryland. Proposed District 4 fills out the rest of Prince George’s County and picks up the necessary population in Montgomery County to achieve equality. 73 percent of the population in Proposed District 4 is in Prince George’s County.

Proposed Districts 2 and 8 were drawn to be fully contained within Baltimore County and Montgomery County, respectively. The arching shape of Proposed District 2 is determined by the desire to respect the border between Baltimore County and Baltimore City, while keeping Proposed District 2 wholly within Baltimore County. Similarly, Proposed District 8 begins in

Montgomery County where Proposed District 6 ends. It is drawn to be a compact district that includes the large municipalities in the County (particularly, Gaithersburg and Rockville).

Proposed District 7 is a Baltimore City-based district. It fully contains the city (which constitutes 76 percent of the district) and acquires the necessary population from the remainder of Baltimore County and Anne Arundel County in order to make it as compact as possible. As a result, it seemingly takes a “bite” out of the Anne Arundel portion of Proposed District 3. However, entering in Anne Arundel allows District 3 to keep Howard County whole and to create what is basically a two-county district between Anne Arundel and Howard County. 99 percent of the population in the district lives in those two counties, with just one percent coming from Calvert to make up the necessary population.

### **Conclusion**

The Commission’s Congressional District Plan complies with all the applicable legal criteria and provides a reasoned basis for the districts even beyond what was legally required. It complies with one person one vote, avoids race-based vote dilution or use of race as a predominant factor, and complies with the Voting Rights Act. It also abides by the natural boundary, political subdivision, and compactness requirements of the Executive Order. It does all this while ignoring partisan or incumbency-related considerations.

In many respects, this congressional district map, in both substance and the procedure that led to it, could serve as a model for the nation. As is known to this Committee, I have worked with many commissions and courts, serving as a nonpartisan expert. Commissions around the country are falling apart due to partisan division, but the Maryland Citizens Redistricting Commission stands in stark contrast. Republicans, Democrats, and Independents worked together, with public input, to draw consensus maps. There were few, if any, points of significant contention, and when there were, compromise was readily sought and achieved. At a time when bipartisan and independent institutions like this Commission become an endangered species, it is worth highlighting and celebrating this rare instance of successful negotiation and commitment to serve the public interest.