

Virginia Retirement System 2017 Fiscal Impact Statement

1. Bill Number: HB 2251

House of Origin	<input type="checkbox"/>	Introduced	<input checked="" type="checkbox"/>	Substitute	<input type="checkbox"/>	Engrossed
Second House	<input type="checkbox"/>	In Committee	<input type="checkbox"/>	Substitute	<input type="checkbox"/>	Enrolled

2. Patron: Jones

3. Committee: Appropriations

4. Title: Virginia Retirement System; optional defined contribution plan.

5. Summary: Requires the Virginia Retirement System (VRS) to establish an optional defined contribution (ODC) retirement plan for state and local employees. Participation in the plan is in lieu of other retirement plans offered by VRS. Employees hired on or after July 1, 2019, shall make an irrevocable election whether to participate in the plan. A person who is employed on June 30, 2019, shall make an irrevocable election by October 31, 2019, to participate in the new retirement plan beginning January 1, 2020, in lieu of his retirement plan at the time. If such employee elects to participate in the new plan, his retirement plan at the time of election will be "frozen" and not increase because of compensation earned or years of service earned while participating in the new plan. Under the plan, the employer makes a mandatory contribution in the amount of 8.5 percent of the employee's compensation, and the employee contributes five percent of his compensation. The substitute provides a five-year vesting schedule with respect to employer contributions to the defined contribution plan and associated forfeiture provisions that authorize the Board to establish a forfeiture account and specify its uses. The Hybrid Retirement Plan has similar forfeiture provisions. Generally, the forfeiture account provides a mechanism for the collection of unvested employer contributions and allows for such forfeited amounts to offset required employer contributions in a manner prescribed by the Board.

6. Budget Amendment Necessary: Yes. Item 489. VRS estimates implementation costs to be approximately \$4.756 million spread over FY 2018, FY 2019, and part of FY 2020. Implementation for this bill will be concurrent with major scheduled deliverables for VRS' ongoing comprehensive information technology Modernization program. VRS therefore anticipates potential additional impact, largely due to specialized information technology resources required, could result in an approximately 15% overage in the remaining costs associated with Modernization (estimated at \$450,000). We will attempt to minimize this impact by integrating this software development work with other ongoing activities. We will continue to monitor progress in this regard, as well as any additional legislative implementation beyond this bill. Upon implementation, ongoing costs are estimated at \$640,000 annually. The changes made by the substitute are likely to increase the required programming costs for the TPA and VRS, but the exact impact is unknown at this time. However, as a similar provision is employed in the Hybrid Retirement Plan, such experience will be leveraged to improve the implementation efficiency.

Implementation and ongoing costs were estimated in part based on similar experience related to the Hybrid Retirement Plan and the recent 403(b) legislation.

Implementation costs cover a number of items necessary to begin the plan. Such costs include support for technology staff to make adjustments to VRS' systems to accommodate a new plan, additional support and training for customer relations staff (e.g., the VRS call center), and support for education and outreach as well as public relations activities, which include the creation of a new member handbook and website for the new plan, the development of a member calculator to assist with the election between the new optional plan and the otherwise applicable VRS plan, and an outreach campaign designed to educate employers and members on the new plan. As there is an election window in this legislation, particular attention must be given to communicating this plan to employers and members. These efforts include but are not limited to in-person meetings across the Commonwealth, webinars, and other trainings.

The implementation and ongoing costs include the following positions:

- 1 FTE and 1 part-time employee (Employer Reporting) – 1 is a permanent FTE, 1 is a 6 month temporary employee to coordinate opt-ins
- 1 FTE (Accounting) – ongoing
- 3 part time temporary employees (2 curriculum developers and 1 trainer) – implementation/first year
- 1 part-time employee (Communications) – implementation/first year and ongoing
- 1 part-time employee (Web) – implementation/first year and ongoing
- 1 part-time employee (DC plans) – ongoing
- 2 FTE in customer contact center (Hybrid/ODC) – implementation/first year and ongoing
- 1 FTE in customer contact center (Member Education Outreach Counseling) – implementation/first year and ongoing

7. **Fiscal Impact Estimates:** The proposed legislation establishes an optional defined contribution plan for state and local employees. Based in part on historical elections of VRS members who have had the option of either electing an optional defined contribution plan or membership in VRS Plan 1, Plan 2, or Hybrid, we have assumed the following for the purposes of determining potential fiscal impacts, in addition to the direct agency costs discussed in item 6:

Exhibit 1

Plan Election Percentages for New Hires

Employer Group	Plan 1	Plan 2	Hybrid	Optional DC
State	N/A	N/A	30%	70%
Teachers	N/A	N/A	30%	70%
SPORS	N/A	100%	N/A	0%
VaLORS	N/A	100%	N/A	0%
JRS	N/A	N/A	100%	0%
Political Subdivisons - General Employees	N/A	N/A	30%	70%
Political Subdivisons - Hazardous Duty	N/A	100%	N/A	0%

At this time, it is uncertain what the take up rate will be and it may vary by plan and type of employee. More detailed analysis of the estimated cost impacts can be found in Item 8 below.

- 8. Fiscal Implications:** The impact of the HB 2251 substitute on plan funding will vary by plan based on the number of new hires who elect the optional defined contribution plan.

The cost of retirement benefit designs can be compared by looking at the normal cost rate generated by applying the design to a group of employees. The normal cost rate is the annual cost of providing retirement benefits for services performed by today's members. At VRS the normal cost is a shared responsibility between the member and the employer. Ideally, all benefits would be funded through the normal cost, however if benefits are increased retroactively, required contributions are not made, or actuarial losses occur, employer contributions must be increased to pay for the unfunded liability.

Exhibit 2, below, shows the cost components for the State plan for the 2018 employer rates. A separate rate is developed for each benefit tier and then the rates are blended together based on the plans' demographics to establish a single blended rate to be paid by the employer.

Exhibit 2

	VRS State Retirement Plan			
	VRS Plan 1	VRS Plan 2	Hybrid	Blended Rate
Total Benefit Normal Cost	9.64%	8.95%	5.17%	9.10%
Member Contribution Rate	5.00%	5.00%	4.00%	4.92%
Employer Normal Cost Rate	4.64%	3.95%	1.17%	4.18%
Employer Match to DC Plan	0.0%	0.0%	1.21%	0.10%
Administrative Expense	0.27%	0.27%	0.27%	0.27%
Total Employer Rate without Unfunded Amortization Cost	4.91%	4.22%	2.65%	4.55%
Amount to Amortize Unfunded Liability	8.94%	8.94%	8.94%	8.94%
Total Employer Rate	13.85%	13.16%	11.59%	13.49%

Currently, approximately two-thirds of the employer rate is associated with paying down the unfunded liabilities of the plan. With the introduction of the ODC plan, VRS would incorporate the new tier of benefits in the calculation of the blended rate to ensure that the unfunded liabilities of the plan would continue to be paid back over the total covered payroll of the employer. As shown in Exhibit 3 below, the cost of the ODC plan proposed in HB 2251 would exceed the cost of the other VRS plan designs. The employer match of 8.5% exceeds the normal cost rate of all of the other current VRS designs.

Exhibit 3

	VRS State Retirement Plan				Optional Defined Contribution Plan (HB 2251)
	VRS Plan 1	VRS Plan 2	Hybrid	Blended Rate	
Total Benefit Normal Cost	9.64%	8.95%	5.17%	9.10%	
Member Contribution Rate	5.00%	5.00%	4.00%	4.92%	5.00%
Employer Normal Cost Rate	4.64%	3.95%	1.17%	4.18%	
Employer Match to DC Plan	0.0%	0.0%	1.21%	0.10%	8.50%
Administrative Expense	0.27%	0.27%	0.27%	0.27%	0.27%
Total Employer Rate without Unfunded Amortization Cost	4.91%	4.22%	2.65%	4.55%	8.77%
Amount to Amortize Unfunded Liability	8.94%	8.94%	8.94%	8.94%	8.94%
Total Employer Rate	13.85%	13.16%	11.59%	13.49%	17.71%

Currently, the discount rate used to value plan liabilities is assumed to be 7%. Due to recent economic indicators and the current federal policy on managing short-term interest rates, some have suggested that long-term expectations on fund returns should be lowered. However, VRS has maintained a 7% discount rate since 2010 and was at the forefront of plans migrating away from higher discount rates. Lowering the discount rate would increase the plan's liabilities and cost. Exhibit 4 below shows that even if the discount rate was reduced to 6.5%, the cost of the ODC plan matching contribution under HB 2251 exceeds the blended State plan normal cost rate of 5.45%. Since VRS employs a blended contribution rate across its plans, a portion of the ODC rate will be to amortize unfunded liabilities. However, the ODC will not add to unfunded liabilities.

Exhibit 4

Virginia Retirement System State Plan - Discount Rate Sensitivity Analysis

	Discount Rate		
	7.00%	6.75%	6.50%
Total Normal Cost Rate	9.10%	9.58%	10.10%
Member Contribution Rate	4.92%	4.92%	4.92%
Employer Normal Cost Rate	4.18%	4.66%	5.18%
Administrative Expense Load	0.27%	0.27%	0.27%
Total Employer Normal Cost Rate	4.45%	4.93%	5.45%
Amortization Rates for Unfunded Liabilities			
Legacy Unfunded	10.91%	10.61%	10.33%
2014 Gain	-0.79%	-0.77%	-0.76%
2015 Gain	-1.18%	-1.15%	-1.13%
Change in Discount Rate	N/A	1.12%	2.25%
Total Amortization Rate	8.94%	9.81%	10.69%
Total Employer Rate	13.39%	14.74%	16.14%

* The rates above are for the defined benefit plan only and do not include the employer match for the defined contribution component of the hybrid plan.

As members are added to the ODC plan, VRS expects the employer cost, as a percentage of payroll, to increase over time as the larger employer match is blended in with the other VRS plans. The HB 2251 substitute includes a vesting schedule and forfeiture provisions for employer contributions. The impacts of these modifications have been incorporated into the following analysis and lower the previous cost estimates provided in the earlier impact statement for HB 2251. Exhibit 5 below shows the estimated increase in employer contribution rates for the State and Teacher plans under varying optional plan election scenarios.

Exhibit 5

Estimated Increase in Employer Contribution Rates - State

Percentage Electing Optional DC Plan	Year 1	Year 5	Year 10	Year 20	Year 25
30% Elect	0.90%	1.64%	2.23%	3.17%	3.47%
50% Elect	0.90%	2.16%	2.95%	4.20%	4.63%
70% Elect	0.90%	2.69%	3.70%	5.26%	5.81%

Estimated Increase in Employer Contribution Rates - Teachers

Percentage Electing Optional DC Plan	Year 1	Year 5	Year 10	Year 20	Year 25
30% Elect	0.69%	1.35%	1.96%	2.99%	3.28%
50% Elect	0.69%	1.84%	2.62%	4.03%	4.40%
70% Elect	0.69%	2.35%	3.31%	5.13%	5.55%

Exhibit 6 below shows the expected cost impacts over the next six years using an effective date of July 1, 2019 for the ODC plan and using the election percentages from Exhibit 1 as a basis for plan membership. Exhibit 6 assumes 70% of State, Teachers, and general employees of Political Subdivisions would choose the optional defined contribution plan under the proposed plan design. However, as shown in Exhibit 5, should the take-up rate differ from the 70% assumption, the employer costs illustrated in Exhibit 6 will vary. In addition, the cost impacts do not reflect any costs associated with current VRS plan members electing to participate in the optional defined contribution plan via an election window.

Exhibit 6

	<u>FY 2018</u>	<u>FY 2019</u>	<u>FY 2020</u>	<u>FY 2021</u>	<u>FY 2022</u>	<u>FY2023</u>
State - General Fund	\$ -	\$ -	\$ 15,316,900	\$ 14,390,100	\$ 18,501,400	\$ 22,540,300
SPORS - General Fund	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
VaLORS - General Fund	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
JRS - General Fund	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Teacher - General Fund	\$ -	\$ -	\$ 21,096,700	\$ 38,847,800	\$ 51,528,800	\$ 63,840,500
TOTAL General Fund	\$ -	\$ -	\$ 36,413,600	\$ 53,237,900	\$ 70,030,200	\$ 86,380,800
State - Non-General Funds	\$ -	\$ -	\$ 20,528,500	\$ 19,286,400	\$ 24,796,600	\$ 30,209,800
SPORS - Non-General Funds	-	-	-	-	-	-
VaLORS - Non-General Funds	-	-	-	-	-	-
TOTAL - Non-General Funds	\$ -	\$ -	\$ 20,528,500	\$ 19,286,400	\$ 24,796,600	\$ 30,209,800
Teacher - Local Funds	\$ -	\$ -	\$ 31,645,100	\$ 58,271,600	\$ 77,293,100	\$ 95,760,700
Political Subdivisions - Local Funds	\$ -	\$ -	\$ 18,382,700	\$ 35,802,600	\$ 42,638,200	\$ 49,443,700
TOTAL Local Funds	\$ -	\$ -	\$ 50,027,800	\$ 94,074,200	\$ 119,931,300	\$ 145,204,400
Grand Totals	\$ -	\$ -	\$ 106,969,900	\$ 166,598,500	\$ 214,758,100	\$ 261,795,000

Estimated projections based on employee data and valuation results as of June 30, 2016 and assume a level population throughout projection period.

Payroll projections are assumed to remain level throughout projection period.

Exhibit 7 below shows the expected employer contribution rates for the State plan broken down by the normal cost rate (blue), the employer match to the defined contribution component of the Hybrid (yellow), and the amortization of the unfunded liability (green). The exhibit helps to show that the unfunded liability is the major component of employers' cost and also shows that until this is paid off in 2044, rates will continue to be relatively level. The normal cost rate declines over time as the lower cost Hybrid Plan increases in membership and the employer match to the defined contribution component grows through auto-escalation.

Exhibit 7

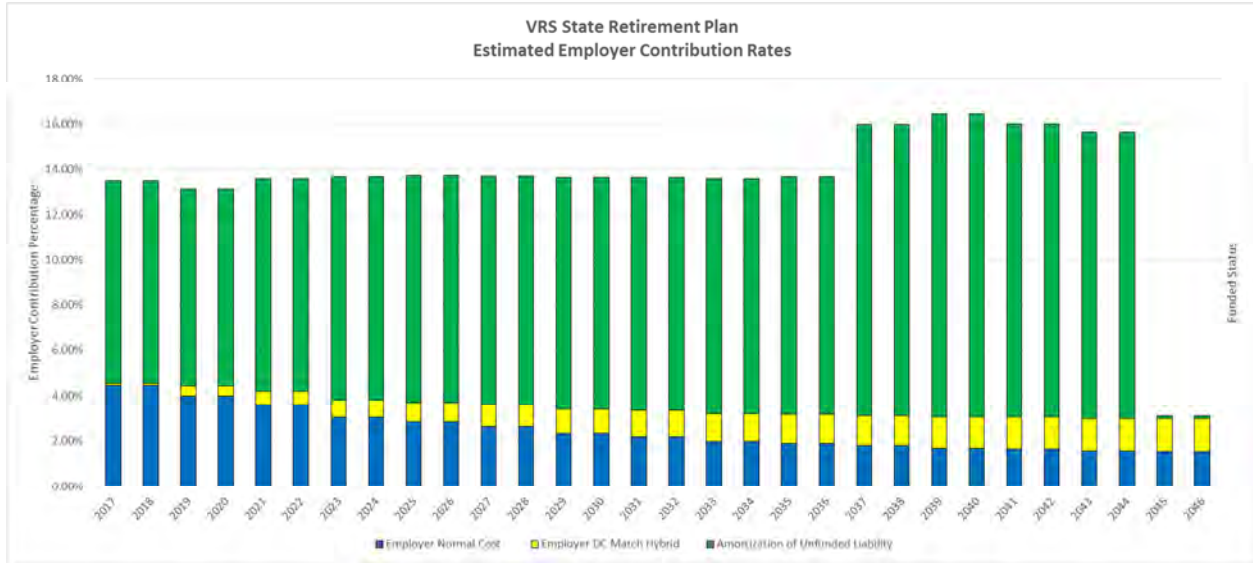
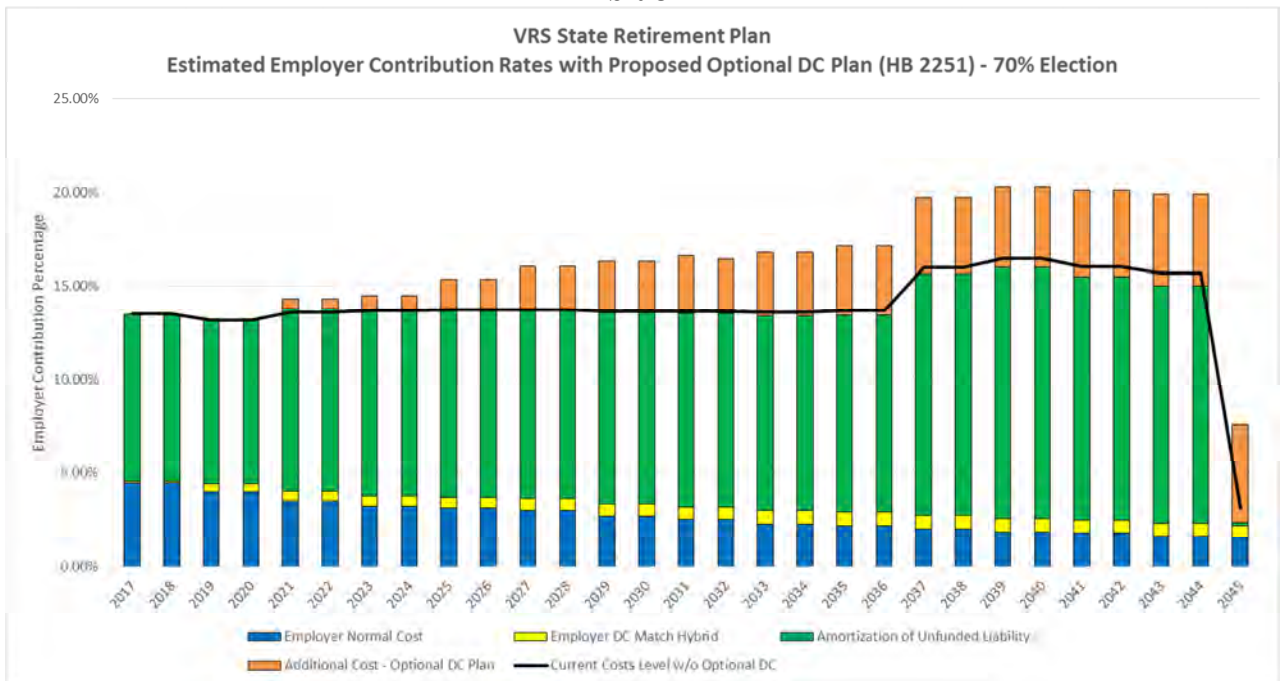


Exhibit 8 shows the same breakdown of the expected employer contribution rates for the State plan assuming the proposed ODC plan under the HB 2251 substitute is enacted and effective July 1, 2019. The exhibit shows that as more members elect the ODC plan rather than the Hybrid Plan, the employer match for the ODC plan (orange) adds approximately 5% of covered payroll to the cost of employer benefits. However, as noted previously the ODC will not result in the addition of any unfunded liabilities to the plan.

Exhibit 8



Item 11 below contains information pertaining to the benefit levels provided by the VRS plans, including the proposed ODC plan under the HB 2251 substitute.

- 9. Specific Agency or Political Subdivisions Affected:** VRS, all state agencies, and all political subdivisions who are VRS-participating employers.

- 10. Technical Amendment Necessary:** No.

- 11. Other Comments:**

General Comments Regarding Pension Reform and Overall Plan Design

New plan designs introduced by previous pension reforms (i.e., Plan 2, Hybrid) have remained as new tiers under the current VRS plan structure. As each tier has been incorporated into the overall plan design, VRS has provided a single blended rate to each employer based on the demographics of the plan. The tiered approach prevents stranding legacy unfunded liability under a closed plan which would require accelerated payback of the unfunded liability and thereby increase costs to the employer.

Under a funding policy other than the tiered approach, excluding new hires from participating in paying down the legacy unfunded liability would force a change in amortization from a level percentage of pay to a level dollar amount, and this change would increase costs to the employer.

VRS assumes that the incorporation of an ODC plan into its overall plan design would follow previous reforms and be structured as an additional tier of benefits. The costs of any ODC plan design would, therefore, need to include an additional charge to pay down legacy unfunded liability.

HB 2251 Substitute Optional DC Plan

The HB 2251 substitute proposes the ODC plan for VRS-covered employees. Upon hire or rehire, an employee would have the opportunity to make an irrevocable election to participate in either 1) the ODC plan, or 2) the otherwise applicable VRS retirement plan based on the employee's individual circumstances (e.g., Plan 1, Plan 2, or the Hybrid Plan). An election to participate in the ODC plan would be in lieu of participating in the otherwise applicable VRS retirement plan. The ODC plan is modeled to be similar to the existing Optional Retirement Plan for Political Appointees ("ORPPA") and would become effective July 1, 2019. The substitute bill adds a five-year vesting schedule prior to an ODC member becoming eligible for employer contributions and associated forfeiture provisions that authorize the Board to establish a forfeiture account and specify its uses. The Hybrid Retirement Plan contains similar forfeiture provisions. Generally, the forfeiture account provides a mechanism for the collection of unvested employer contributions and allows for such forfeited amounts to offset required employer contributions in a manner prescribed by the Board. The delayed effective

date reflects the significant implementation and communication campaign that VRS would need to execute leading up to the ODC plan becoming effective, including facilitating an election window for current employees. The delayed effective date also allows for continued progress with regard to VRS' comprehensive ongoing Modernization effort (which includes both migrating off of a mainframe platform to a client server environment and improving as well as enhancing capabilities and functionality).

A small portion of VRS-covered employees would not be eligible to participate in the ODC plan. Such employees represent those who already have the opportunity upon hire to elect an optional defined contribution plan administered by VRS. For example, ORPPA members, Optional Retirement Plan for Higher Education members, and Optional Retirement Plan for School Superintendents members would not be eligible for the ODC plan. Otherwise, the vast majority of VRS members would be eligible to participate, including those who participate in the State Police Officers' Retirement System ("SPORS"), the Virginia Law Officers' Retirement System ("VaLORS"), the Judicial Retirement System ("JRS"), and those employees of a participating political subdivision eligible for enhanced hazardous duty provisions.

In addition to new employees and rehired employees, existing employees would also be granted a one-time opportunity to irrevocably elect the ODC plan. This is consistent with the period leading up to the implementation of the Hybrid Plan on January 1, 2014, when then-existing VRS members had the opportunity to irrevocably elect the Hybrid Plan. Under HB 2251, an employee active on both June 30 and July 1 of 2019 could elect to transfer into the ODC plan from his or her plan at the time. The election window for existing employees would run from July 1, 2019 through October 31, 2019. Any elections during that period would become effective January 1, 2020. Inaction by an employee would be deemed an election to remain in his or her applicable VRS retirement plan.

For those who participate, all contributions in the ODC plan would be mandatory. An employer would make contributions in the amount of 8.5 percent of creditable compensation, and an employee would make member contributions in the amount of five percent of creditable compensation. All contributions would be made into the employee's ODC 401(a) account, similar to a 401(k)-style account. Under the original bill there was no vesting requirement to the employer contributions, but under the substitute an employee would vest to the employer contributions gradually over a five-year period of continuous participation in the ODC plan (20% per year). No loans or hardship distributions are available from either employer or employee contributions.

Ancillary Benefits and Disability Coverage

Just like Plan 1, Plan 2, and Hybrid Plan members, an ODC plan member would be eligible for the following ancillary benefits administered by VRS:

- As applicable, the Virginia Sickness and Disability Program ("VSDP") or the Virginia Local Disability Program ("VLDP"), or a comparable disability plan offered by the political subdivision

- As applicable, the VSDP Long-Term Care Plan or the VLDP Long-Term Care Plan
- VRS Group Life Insurance Program
- Health Insurance Credit for eligible employees
- As applicable, the Commonwealth of Virginia 457 Deferred Compensation Plan and the Virginia Cash Match Plan

With respect to VSDP, VLDP, and comparable disability plan benefits, an ODC plan member would receive short-term disability benefits for 125 working days at varying income replacement rates of 100%, 80% and 60% of creditable compensation (the duration of each replacement rate is based on length of service). Assuming continuing eligibility, the member would transition to a long-term disability benefit at an income replacement rate of 60%, and this benefit would continue until the member returns to work, dies or reaches his normal retirement date. However, there are no employer contributions made to the defined contribution account of an ODC plan member who is receiving long-term disability benefits unless the member is totally and permanently disabled (as defined in § 22(e)(3) of the Internal Revenue Code, which is the standard for Social Security disability).

In addition, an ODC plan member who is a state employee could become eligible for the State Retiree Health Benefits Program, which is administered by the Department of Human Resource Management.

Varied Effective Dates

Although the provisions of the HB 2251 substitute would become law on July 1, 2017, the practical effective dates vary. The following timeline demonstrates the effective implementation dates contained in the bill:

- July 1, 2019 – The ODC plan will begin and all eligible employees hired or rehired on or after this date will have the option to elect the ODC or the otherwise applicable VRS retirement plan
- July 1, 2019 through October 31, 2019 – All employees actively employed in a VRS-covered position on June 30, 2019 and July 1, 2019 will have the option to elect the ODC plan or the otherwise applicable VRS retirement plan
- January 1, 2020 – All elections by preexisting employees to participate in the ODC plan will become effective on this date

HB 2251 Substitute Optional DC Plan Design Background

In 2016, the Virginia Commission on Employee Retirement Security and Pension Reform (the “Commission”) adopted a recommendation that the General Assembly should consider creating an optional defined contribution plan similar to ORPPA.

The plan design features contained in the HB 2251 substitute differ from the plan design of the defined contribution component of the Hybrid Plan enacted in 2014. The Hybrid defined contribution component established a minimum automatic match by the employer (1%) but

required the employee to take a more active role in retirement planning by making voluntary contributions (up to 4%) in order to receive the additional matching dollars from the employer (up to an additional 2.5%). The HB 2251 substitute provides that the employee contribute 5% of compensation and in turn will receive an 8.5% matching contribution from the employer, providing a total contribution of 13.5%. This design differs from designs commonly found in private sector ERISA plans, in which there is typically an employer match.

The HB 2251 substitute provides a vesting schedule with respect to the employer contributions to the defined contribution plan, which is designed to act as a retention incentive for employees. The proposed vesting schedule is five years:

- Less than 1 year – 0% vested in employer contributions
- 1 year – 20% vested in employer contributions
- 2 years – 40% vested in employer contributions
- 3 years – 60% vested in employer contributions
- 4 years – 80% vested in employer contributions
- 5 years – 100% vested in employer contributions

The defined contribution component of the Hybrid Plan also includes a vesting schedule for employer contributions. For reference, the Hybrid vesting schedule is four years, as follows:

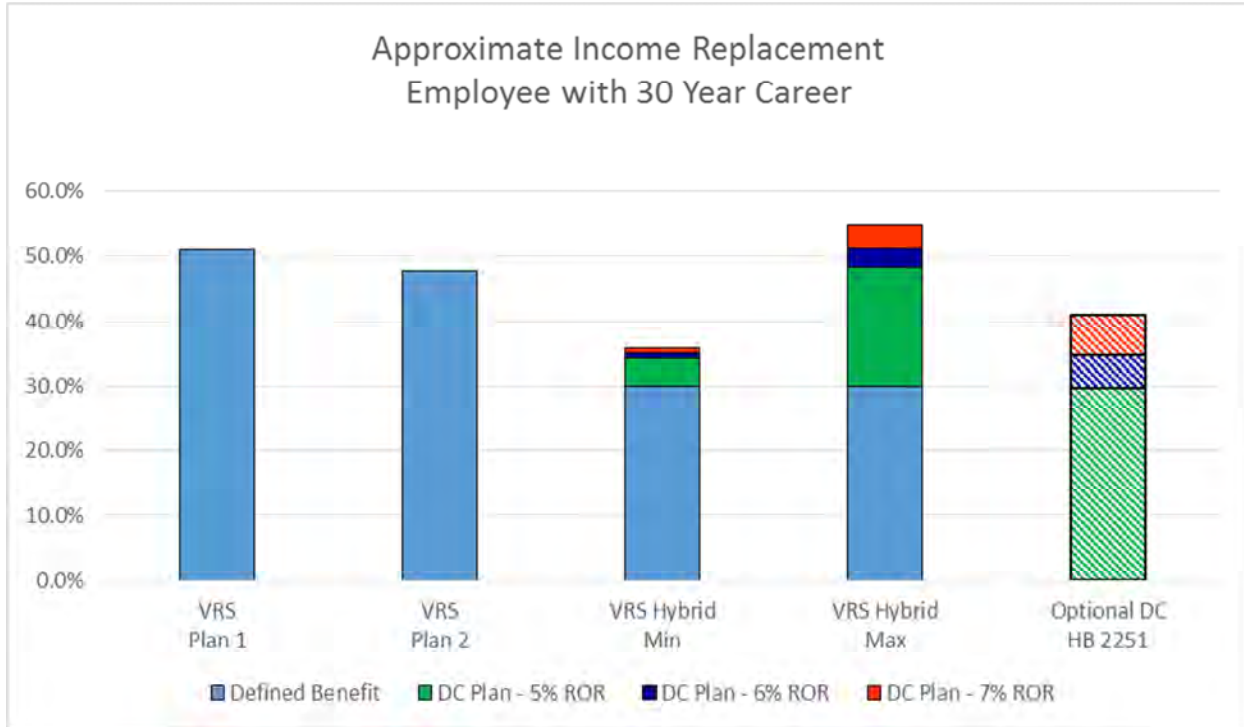
- Less than 2 years – 0% vested in employer contributions
- 2 years – 50% vested in employer contributions
- 3 years – 75% vested in employer contributions
- 4 years – 100% vested in employer contributions

Benefit Comparison – Replacement Ratios

The following analysis provides a comparison of expected benefits using differing employee scenarios under the current VRS plan designs as well as the benefit provided under the ODC plan in the HB 2251 substitute.

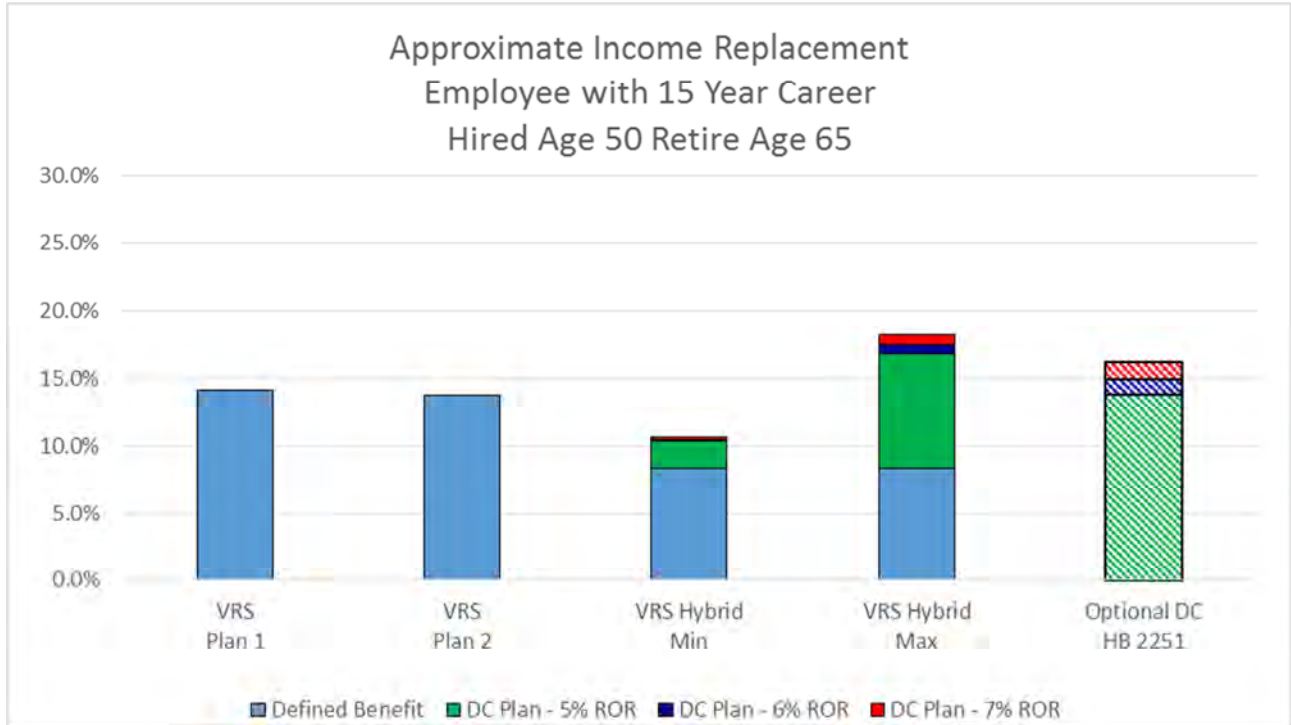
Scenario 1 (Exhibit 9) provides the estimated replacement ratios for a 30-year employee hired at age 35. The defined contribution component of the Hybrid as well as the ODC plan are modeled assuming three sets of long-term rates of return on fund balances: 5%, 6%, and 7%. Assuming a 6% pre-retirement rate of return, the VRS Hybrid Plan at the minimum required level and the ODC plan provide approximately the same level of benefit. Lower returns make the Hybrid more desirable, while higher returns make the ODC plan more valuable.

Exhibit 9



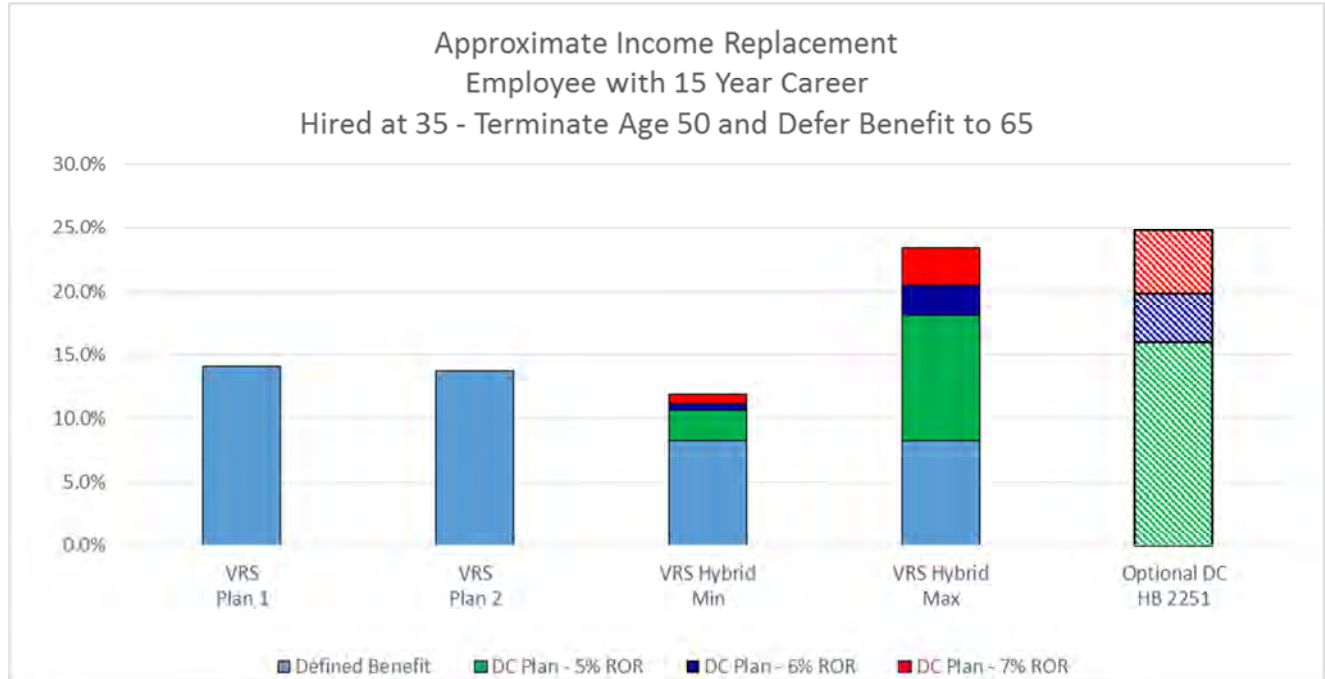
Scenario 2 contains two variations and provides the estimated replacement ratios for a 15-year employee. The first variation (Exhibit 10) is a mid-career hire at age 50 who retires at age 65. Under this variation, the ODC plan assuming the 6% pre-retirement rate of return could provide the same level of benefit as a Plan 1 member with 15 years of service.

Exhibit 10



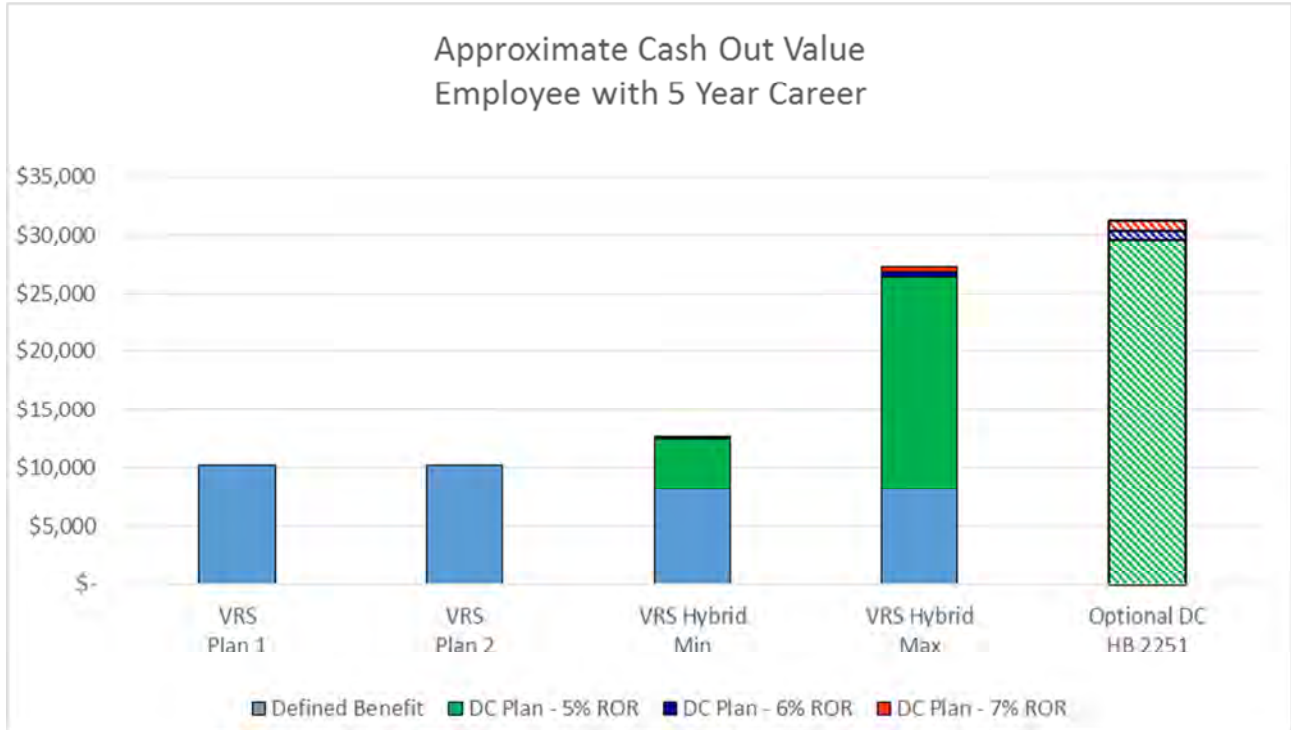
The second variation of the 15-year scenario is a member hired at age 35 who terminates after 15 years at age 50 and defers a benefit to age 65 (Exhibit 11). Under this variation, the additional interest earned from age 50 to age 65 provides a higher level of benefit in the ODC plan.

Exhibit 11



Scenario 3 (Exhibit 12) is a short-term employee who is hired at age 35, terminates at age 40, and elects a refund. This scenario highlights the upfront costs of the defined contribution plans for short-term employees versus the back loading of defined benefit plans that generally reward long-term employees and provide a retention tool for employers.

Exhibit 12



Other States

According to information presented by the Pew Charitable Trusts to the Commission on Retirement Security and Pension Reform, eight other states offer an optional defined contribution plan to state employees or teachers. Combined employer and employee contributions in such plans range from 6% to 16% for those whose participants also contribute to Social Security. This compares to the ODC plan combined contribution rate under the HB 2251 substitute of 13.5%. The combined contribution rate is higher for the optional defined contribution plans for other states in which participants do not contribute to Social Security.

In addition to the eight states that offer an optional defined contribution plan, three states administer a mandatory defined contribution plan for state employees or teachers.

Date: 02-08-2017

Document: HB2251H1.DOC/VRS