

DepEd's Voucher Program: A Promising Tool for Rationalizing Government Financing Assistance and Subsidies

Rationalizing Government Assistance and Subsidies
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INTRODUCTION

1. In January this year, the President and the Secretary of Education announced its vision and development strategy for the education sector (laid out in BEP 2023).
2. One of the elements of the strategy is the expansion of DepEd's voucher program, a government education financial assistance program.
3. The program enables more students to enroll in eligible (for-profit or non-profit) schools of their (or their parents') choice.
4. Introduced at the start of the K-12 program, it was seen as a cost-effective way to provide additional school places for incoming Senior High School students._
5. Interestingly, the announcement came on the heels of rising concerns about low student learning achievement and the failure of government reforms of past governments to achieve substantial and sustained improvements in student learning.

OBJECTIVE OF THE PRESENTATION

My task today is to provide empirical, analytical and policy context of the voucher program.

Acknowledgement

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CHART 1

The Philippines has been successful in achieving near-universal basic education and a relatively high number of years of schooling completed.

Philippines' performance in the Human Capital Index (World Bank, 2018)

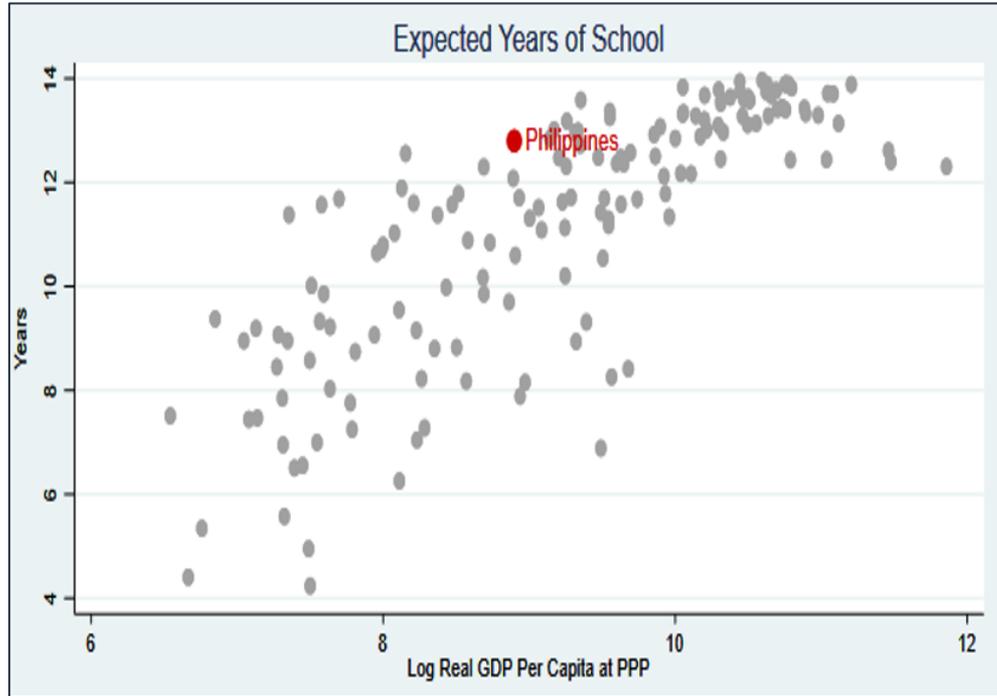


CHART 2

But the learning proficiency levels achieved by most of our students in basic education are below minimum national/int'l standards.

Percentage of
Grade 6 students
by Level of
Proficiency
(All subjects, NAT
SY 2016-17 and SY
2017-18)

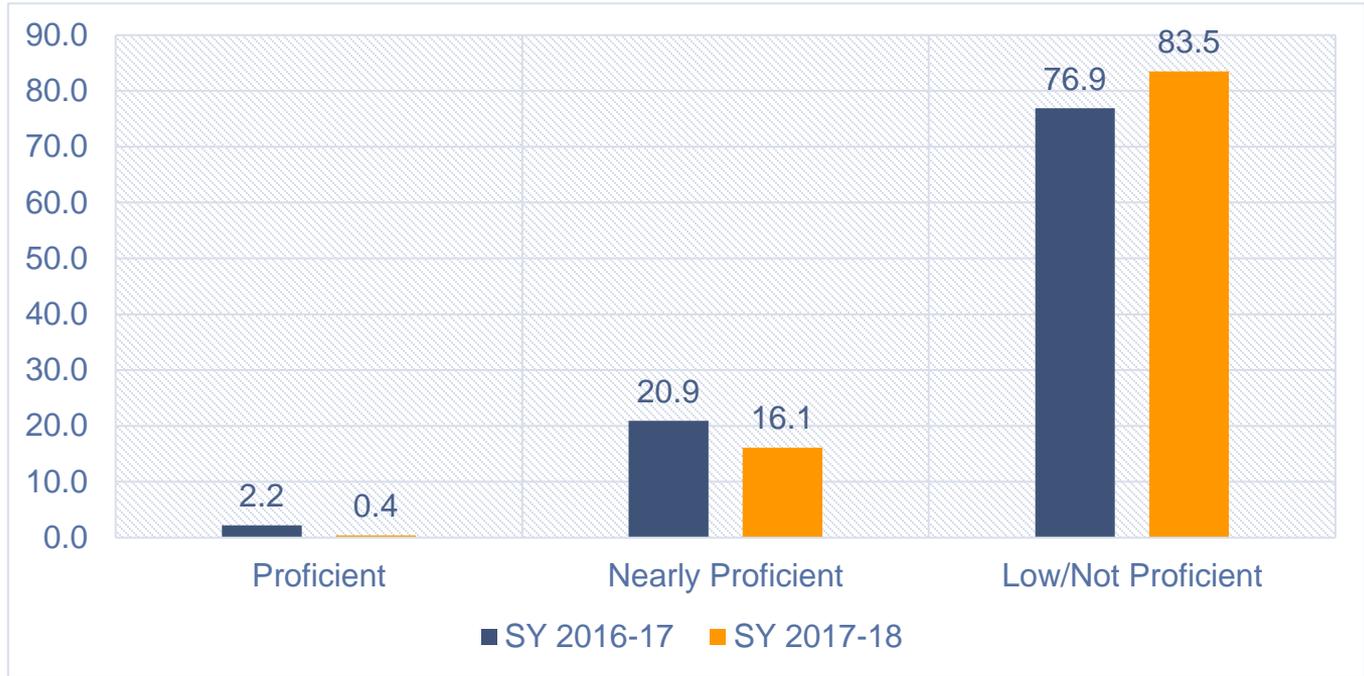


CHART 3

Not surprisingly, the expected educational attainment of the average Filipino children is low when adjusted for actual learning achieved.

Estimated learning gap was 4.5 years according to World Bank 2018 Human Capital Report. The gap increased to 5.5 years according to 2020 update cited by Orbeta and Paqueo (2022).

Gap = estimated difference in the level of educational attainment of Filipino children expected to achieve with vs without adjustments for student learning achievements.

Philippines' Learning Gap (World Bank, 2018)

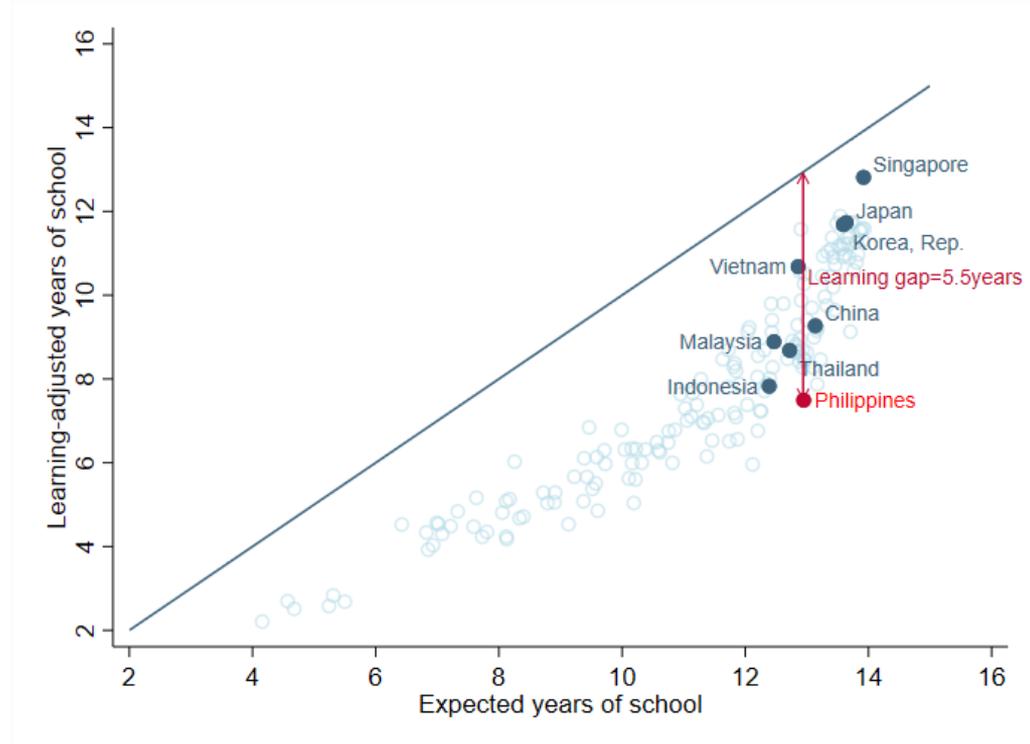
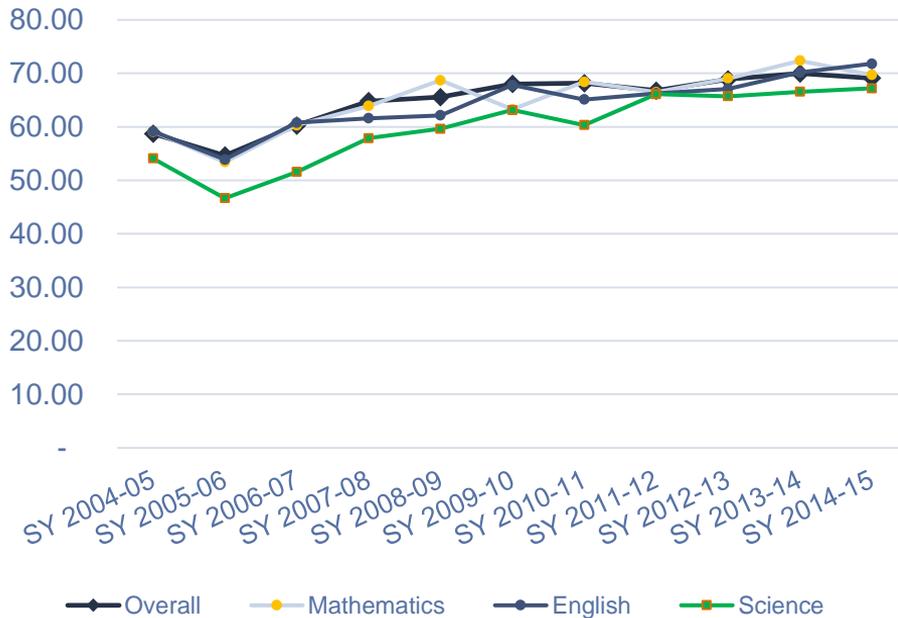


CHART 4.1 & 4.2

More concerning is that learning achievement indicators have improved only slightly, if at all, during the past decades (according to most recent NAT data) despite reforms and more inputs.

NAT Scores of Grade 6 Students, SY 2004-05 to SY 2014-15



NAT Scores of Grade 10 Students, SY 2011-12 to SY 2014-15

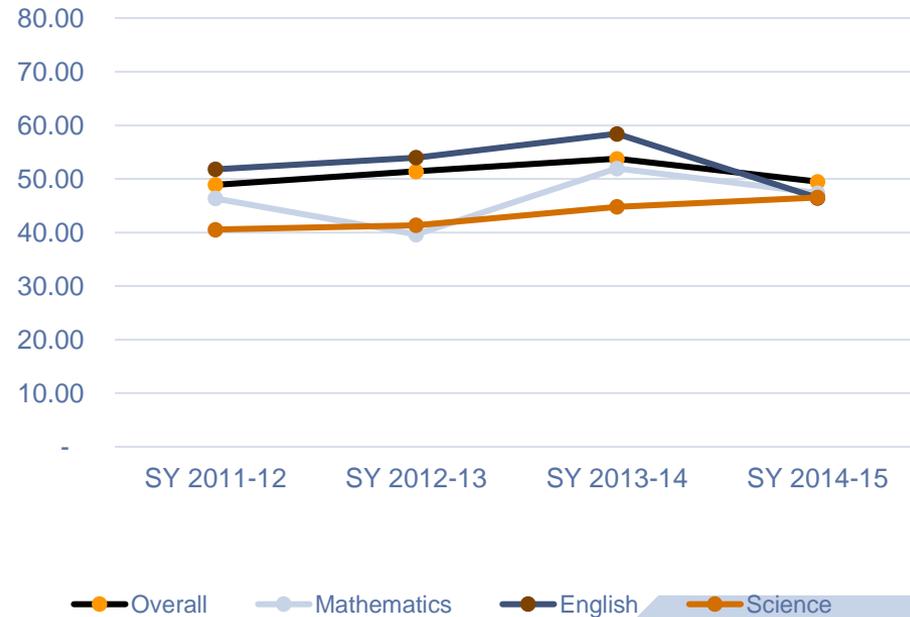


CHART 6

International assessments also show gaps in the level of proficiency of our students

Trends in International Mathematics and Science Study (TIMSS) on average performance in Science, 2019

TIMSS data clearly shows that on average:

1. 4th grade students learn much less than those in countries with similar GDP/capita as the PH.
2. Private school students are performing much better than students enrolled in public schools in the PH

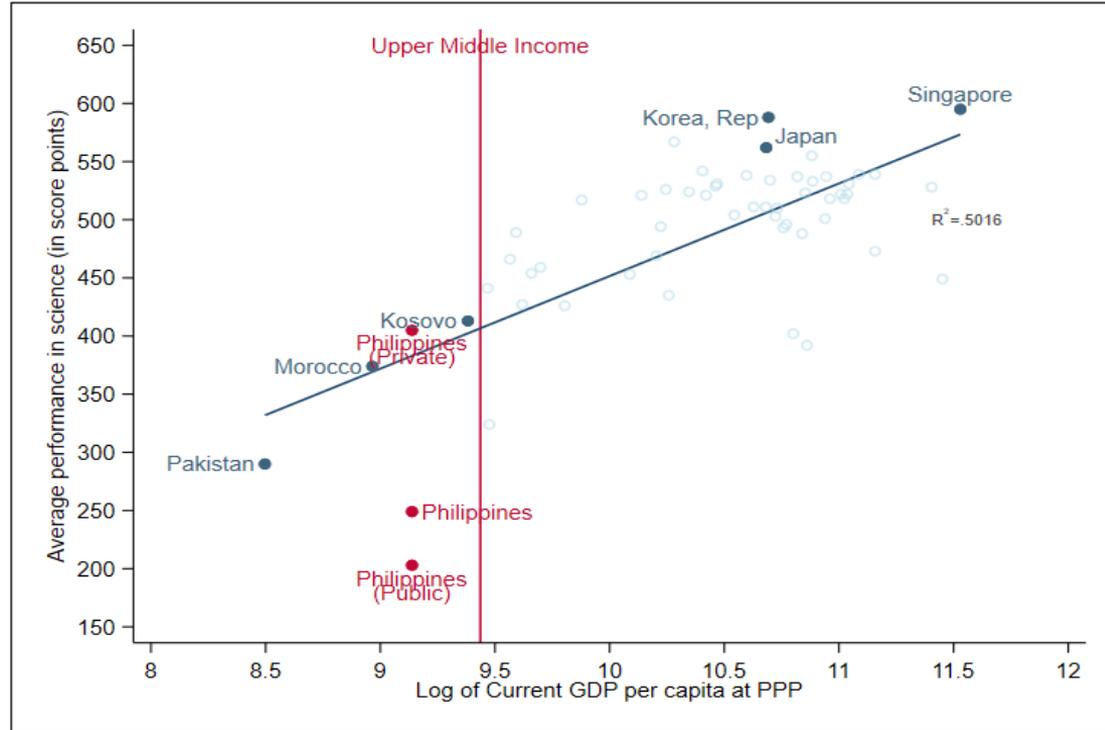
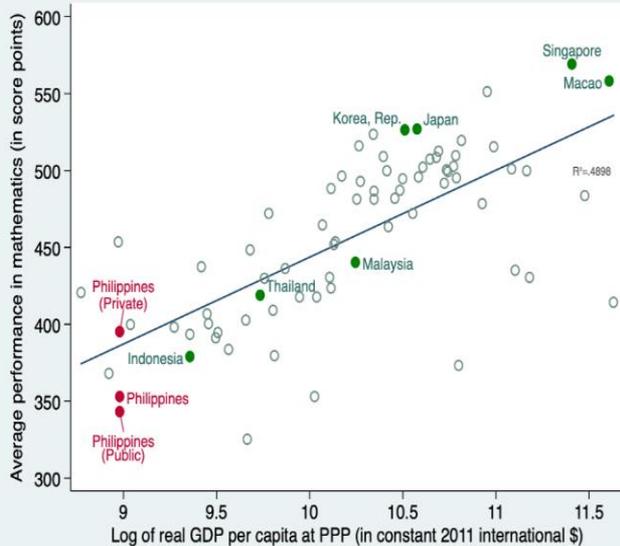


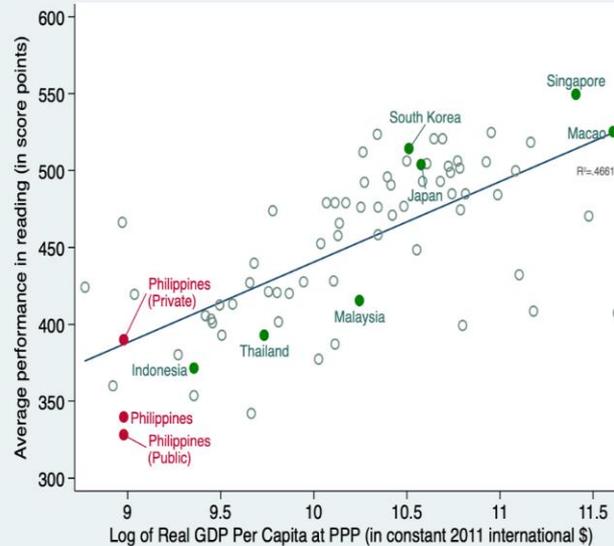
CHART 7

The 2018 Programme for International Student Assessment (PISA), which includes 15-year students confirm TIMSS finding.

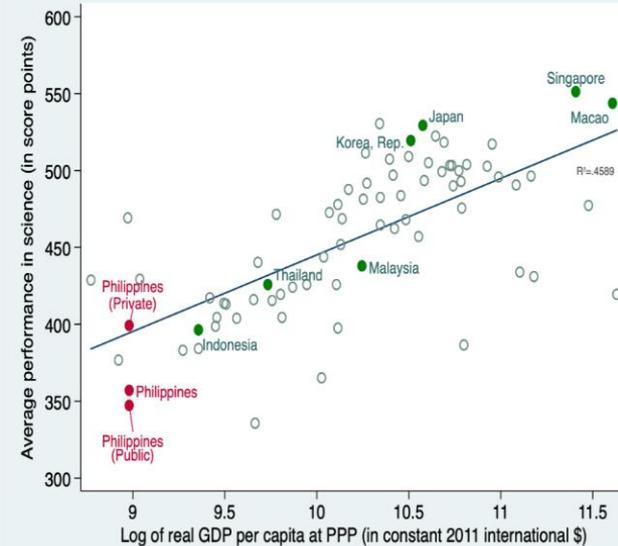
MATHEMATICS



READING



SCIENCE



So, why is learning achievement higher for private than public school students on average?

- A widely accepted hypothesis is that private school students belong to families with a higher socioeconomic status
- Another hypothesis is that private schools are more resourceful, effective and efficient in the use of resources relative to public schools
 - ▶ Private schools and their teachers have to be more effective, efficient and innovative relative to other providers to be able to mobilize student fees and donations to survive, flourish and enjoy more profits and psychic income.
 - ▶ In contrast, the survival of public schools and the level of their teachers' salaries and benefits do not depend on their effectiveness and efficiency, at least not as critically as the private schools do.
 - ▶ Consequently, even if one were to hold student characteristics and other endowment the same, choice of private over public education are likely to lead to higher student learning, as empirically indicated by our research.

TABLE 1

Correlations Between PISA 2018 Test Scores and Private School Attendance Using Multivariate Regression

VARIABLES	Math	Science	Reading
Sex	-8.768*** (3.278)	-1.700 (3.259)	-25.54*** (1.924)
Age - took test	9.739*** (3.499)	3.397 (3.669)	8.309*** (3.106)
Age-start school	-7.906*** (1.627)	-6.765*** (1.345)	-7.854*** (1.159)
Parents occupation status	0.930*** (0.0900)	0.963*** (0.0897)	1.054*** (0.0910)
Parental education	-1.006** (0.458)	-0.687* (0.401)	-0.534* (0.309)
Home possessions	14.19*** (1.812)	11.15*** (1.895)	15.31*** (1.840)
Private	35.59*** (12.48)	39.03*** (13.17)	44.34*** (12.86)
Private*Parents' occupation	-0.266 (0.196)	-0.152 (0.194)	-0.225 (0.198)
Private*home possessions	6.081 (3.715)	10.74*** (3.846)	9.575*** (3.669)
Constant	248.6*** (52.95)	331.6*** (58.20)	256.1*** (48.74)
Observations	7233	7233	7233

Standard errors in parentheses, *** p<0.01, ** p<0.05, * p<0.1

Source of basic data: PISA 2018

- Private school attendance coefficients are significantly positive, holding constant socioeconomic demographic variables.
- There appears to be a positive interaction between private school attendance and home possessions (a wealth indicator).
- The private school coefficient remains statistically significant even after other variables are included.

TABLE 2
Marginal productivity (regression coefficients) of selected school inputs

- Public but not private school students are significantly adversely affected by educational material shortages
- Coefficients of % school teachers with master's degree significantly positive among private but not public students
- Coefficients of % school teachers fully certified significantly positive among private but not public school students

VARIABLES	Math		Science		Reading	
	Private	Public	Private	Public	Private	Public
Index proportion of all teachers ISCED Level 5A	47.80 (50.10)	-14.46 (17.95)	106.6* (64.33)	-12.92 (16.60)	56.18 (55.62)	-13.57 (14.29)
Index proportion of all teachers fully certified	65.46*** (25.35)	-15.27 (16.72)	76.45** (31.11)	-15.80 (18.79)	71.44*** (27.40)	-12.67 (13.48)
Shortage of Educational Materials	-6.711 (6.951)	-6.507*** (2.516)	-1.707 (10.14)	-6.242*** (2.156)	-3.484 (9.066)	-6.457*** (1.970)
Class size	0.217 (1.010)	-0.0126 (0.562)	0.777 (1.383)	0.227 (0.434)	0.208 (1.307)	0.0309 (0.489)
Student-teacher ratio	-0.757 (0.804)	0.204 (0.438)	-1.302 (1.002)	-0.378 (0.321)	-1.134 (0.891)	-0.103 (0.345)

Source of basic data: PISA 2018

- Class size and student-teacher ratio are uncorrelated with student test scores in both

Findings from counterfactual analysis, using Blinder-Oaxaca decomposition methodology

What would be the gains for the public students if they had the endowments of the private school students and if the latter's endowment coefficients (productivity) could be had by the average public-school students?

- The test scores of public-school students would rise from 357.5 to 402.3 in mathematics, from 360.1 to 408.7 in science, and from 342.3 to 401.5 in reading.
- The increases in test scores would be about 12.6%, 13.5% and 17.3%, respectively.

Variable	Math	Science	Reading
Prediction Private	402.3***	408.7***	401.5***
Prediction Public	357.5***	360.1***	342.3***
Difference	44.87***	48.67***	59.13***
% Rise in public student test scores	12.6	13.5	17.3

Source of basic data: PISA 2018

Comparative view of relative importance of learning gains from private schooling

- Our above-mentioned finding on the potential learning gains from private education is consistent with findings of recent survey of impact studies on developing country experience.
- These surveys show that the impact of private schooling is significant and its effect size is positive and respectable.
- Lee Crawford, Sussana Hares, and Rory Todd (2023), for example, reports that their meta-analysis shows moderately strong effects from private school.
- These authors, though, find that those effect sizes are not nearly enough to help most children reach important learning goals.
- The learning advantage from private schooling alone is not enough; other complementary reform measures are needed to reach sustainable higher levels of learning competencies.

Qualitative Findings from KIIs, FGDs of Leading Education Leaders and Online Survey of School Principals on Innovativeness and Market Responsiveness

Private schools also tend to be more **flexible and quicker to innovate** and adapt to diversity and changes in market demands than public schools, as indicated, for example, by their faster uptake of internet connectivity and other digital technologies.

Private schools **can help provide unmet demands** for course offerings, teacher quality, school amenities, locational convenience, and religious/moral formation that public schools cannot provide.

Alternative education providers stimulate healthy competition

- Highlighted in FGDs by prominent education leaders
- Consistent with multivariate analysis of PISA data indicating that the presence of one or more neighboring schools is significantly and positively associated with higher learning achievements
- Confirming the hypothesis that more school options for students can create healthy competitive pressures.

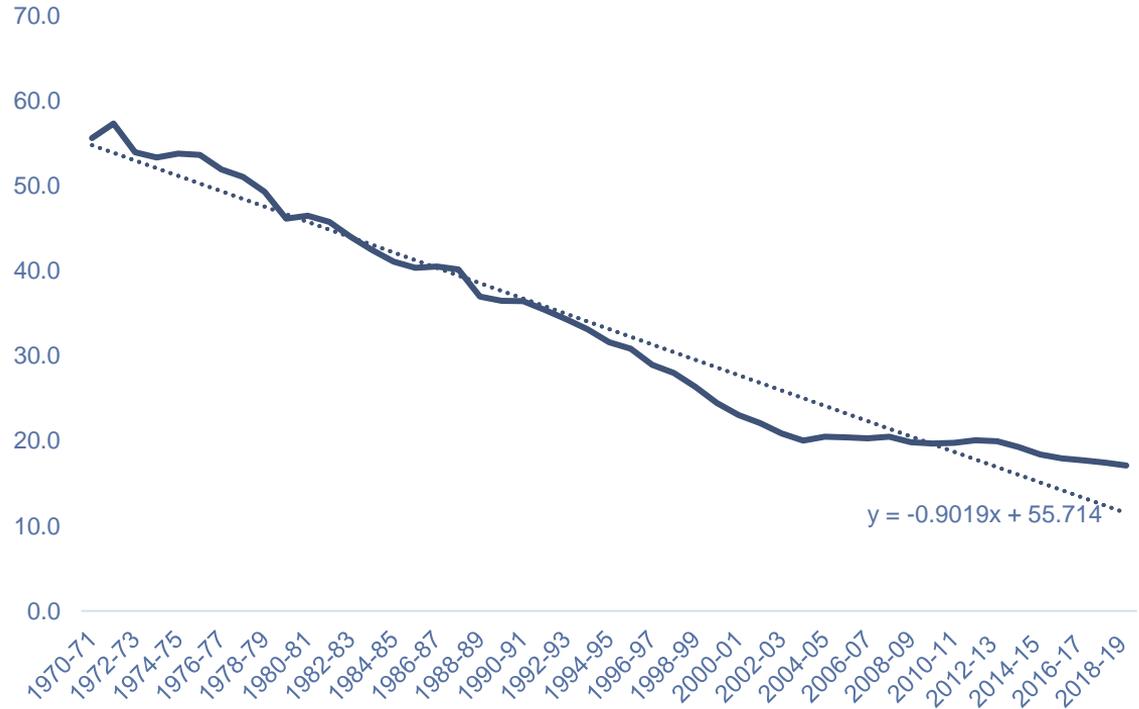
The crowding out and related questions

- So, private schools can energize the Philippine Education System.
- Moreover, data analysis show that they can be more effective and efficient (on average) than public schools in helping children learning competencies that are beneficial not only to individual students personally but also socially to the public at large.
- Why then is the role of private education institutions being eroded over time? [See next slide, Chart 8]
- Is it in the interest of government for the private education sector to survive and thrive?
- If yes, how can the government take full advantage of the strengths of private education sector?

CHART 8

The share of private schools in total Junior High School enrollment has continuously declined from SY1970-71 to SY 2018-19

- Private education is being crowded out at all levels by the expansion of public schools due to lack of level playing field
- In the last couple of years, the COVID 19 pandemic has pushed even further the decline of total enrollment in private schools.



Source: PSA Philippine Statistical Yearbook, various years

Why is crowding out of private schools by public schools concerning?

- First, the relatively more efficient and dynamic part of the education system (private schools) is being crowded out – perhaps unintentionally.
- Nevertheless, second, the crowding out is arguably the likely result of a government strategy that favored expansion of the public school system and created an increasingly uneven playing field over time.
- Third, unintentionally, therefore, the Constitutional mandate on the establishment of an education system to optimize use of public and private sector capabilities is not being implemented adequately.
- The above considerations point to the desirability of adopting more robust counter measures to promote public-private education complementarity, as provided for by the Constitution.

Application of the Economics of Subsidy to Public and Private Education

- Education produces private (individual) benefits; it also generates public good benefits (defined as external or spillover effects that positively benefit the public at large, but that cannot be fully appropriated for themselves by the individuals investing in their own education).
 - In a purely market economy, individual investment in education will be suboptimal from the perspective of societal well-being
 - To address that market failure, Government can subsidize children's education to improve their education and raise societal well-being to optimal levels.
- An important policy question is what is the optimal education subsidy.
- A rule of thumb, it can be argued, is that the subsidy should be equal to the value of the public benefits generated by the additional competencies obtained by students from the government education assistance.

Corollary to the above Education Subsidy Framework

- If the same amount of education subsidy generates public benefits of equal value regardless of whether a person graduated from public or private schools, one can moreover argue that the same amount of education subsidy should also be extended to private school students.
- We can further argue that the subsidy can be provided (a) through the establishment and direct funding of free public schools and/or (b) through financial assistance to students via vouchers to enable them to enroll in eligible fee-charging private schools of their choice.
- Whether Option A or Option B should be taken depends on their relative cost-effectiveness.

Summary of Part 1

- In summary, it appears plausible that deployment of private schools can be a more cost-effective way providing better quality education that could significantly raise learning achievement in the Philippines.
- This conclusion is consistent with findings of studies of developing countries on the relative efficiency of public and private schools [See Jimenez, Lockheed and Paqueo (1991), Angrist et al. (2002), Ashley et al. (2014), Murallidharan and Sundararaman (2013), World Bank (2011), and Patrinos, Barrera and Guaqueta (2009)]
- The impact evaluation study of Colombia's secondary education voucher program, using randomized control trial (Angrist et al. 2014), is particularly useful in thinking about the potential impact of a student financial assistance that enables students to enroll in private schools of their choice.
- The Colombia study and other follow up analyses of the program show that the program has significant impact on secondary education student learning achievement and on education attainment (years completed) relative to comparable students enrolled in public schools.

Summary of Part 1 - Caveat

- Whether the deployment of private schools will actually deliver better quality and more cost-effective education in a particular context need an assessment of the program design, logical framework as well as fidelity of implementation to its planned design.
- This assessment needs to be done on the ground using qualitative methods and statistical analyses of survey and administrative data.
- Dr. Paqueo and I led a team of researchers to do such assessment of the SHS voucher and JHS Educational Service Contracting programs. I will now discuss the findings of our assessment.

Assessment of the Junior High School Education Service Contracting, SHS Voucher Program, and Joint Delivery Voucher Program for SHS Technical- Vocational-Livelihood Specialization

Findings and recommendations from the PACU-PEAC study and DepEd and ADB-assisted research



Overall, the programs are well designed and well implemented as planned, although there are many important issues that that need to be addressed

KEY FINDINGS

1. Reduced congestion in public JHS except in highly urbanized areas (NCR, Reg 4A, Reg 7) and in areas where there are not enough private schools (ARMM)
2. The programs are cost-effective: educating their beneficiary students through eligible private schools of their choice costs less than the average per-student cost of public schools.
3. “Intended” targeting appears to be working but eroding over time, particularly for ESC
4. The voucher schemes, especially the Senior High School Voucher Program, can enable students (parents) to vote with their feet.

Data indicate that the proposed strategy will be welcome to parents and other voters

Household opinion survey (PACU-PEAC study)

- Overwhelming support for SHSVP and the idea of providing government financial assistance that gives students or their parents the ability to enroll in a private school of their choice
- Respondents think current SHS voucher programs should be part of the long-term strategy of DepEd instead of being a temporary stop-gap measures
- Respondents think SHSVP and similar public-private partnership program should be extended to Junior Higher School students' adaptation of the ESC program

Data indicate that the proposed strategy will be welcome to parents and other voters

FGD with parents (DepEd & ADB-assisted study)

- Parents highly value the programs for the opportunity to enroll their children in better quality private schools of their choice.
- Parents expressed the view that even if the quality of accessible private schools were not better than that of public schools, they would still want the program to continue because it enables them to select schools whose program of education is in line with their beliefs, moral values and locational convenience.

Data indicate that the proposed strategy will be welcome to parents and other voters

Online survey of public school principals (PACU-PEAC study)

- Respondents recognize the value of DepEd's public-private partnership schemes and support the idea that they should be part of government's long-term education development

RECOMMENDATION

THE STUDY RECOMMENDS

DepEd to strengthen and expand the programs as part of a broader long-term plan to develop a high-performance basic education system.

HOWEVER,

There are several issues that need to be addressed to improve the governance, design and effectiveness of DepEd's public-private partnership schemes

Cluster of Recommendations

- Need to Clarify and Adapt Program Objectives
- Organization and Management Issues
- Support Systems Issues

Development of the Basic Education Public-Private Cooperation and Partnership (BE-PPCP) Framework

A Long-term Perspective Plan

- Provide clear vision of the direction and path forward
- Provide a basis for developing a shared understanding of the nature, scope, and goals of PPP and strengthening consensus among stakeholders
- Improve coordination of government and private sector efforts in education
- Crafted through the collaborative effort of DepEd, private education organizations, NEDA, DBM and legislative leaders
- Supported by a research agenda and founded on empirically informed view
- Built on the experience of the ESC, SHSVP and JDVP-TVL

CONCLUSION/ KEY MESSAGES

1. The decision of the President and the Secretary of Education to expand DepEd's voucher program is well taken.
2. DepEd's voucher program is a potentially efficient tool for enabling students to enroll in better schools of their choice, especially if adapted, improved and complemented with other measures.
3. The decision to expand DepEd's voucher program is consistent with the findings and recommendations of our assessment report on DepEd's public-private partnership programs.
4. To improve and expand on something that already works reasonably well and is being improved is good practical strategy, especially when there is strong popular support and corroborating evidence for it from other developing countries.

CONCLUSION: Caveat and Risk Mitigation

1. Improvements are needed to further raise the voucher program's effectiveness in achieving sustained reduction of learning poverty.
2. Realistically, expansion of the voucher program alone cannot by itself alone eliminate learning poverty in the Philippines. A more helpful view is to look at the program as part of a broader education development strategy that together with other policy measures (including public school improvements) could eventually lead to zero learning poverty.
3. Other key elements of that larger strategy should include among others:
 - ▶ Improvement of people's information set about school performance
 - ▶ Helping families develop their capacity to provide their children effective emotional support at home and guidance in the formation of a growth mindset and socioemotional skills
 - ▶ Ramping up investment in education and related human development activities, while improving use of available resources in both public and private sectors



THANK YOU!

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