

Documenting Variation in Teacher Contract Provisions



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EFRC SYMPOSIUM
OCTOBER 31, 2008

Introduction



- Teacher quantity, quality, and compensation issues are at the top of the education policy agenda.
 - Strong evidence that high quality teachers matter.
 - Teachers compensation represents two-thirds of school district operating budgets in New York.
- Significant research devoted to understanding teacher labor market decisions and how it is influenced by compensation and working conditions.

Introduction



- General impact of teachers' unions on teacher salaries and productivity have been evaluated in past research.
- However, very little research has examined variation in the content of collective bargaining agreements (so called teacher contracts).
- Lack of attention is surprising given that these agreements arguably represent the most important contractual obligation that school districts make.

Study Objectives



- Principal objective of this study is to document the contents of teacher contracts for a significant sample of New York School Districts.
- We develop a classification scheme and coded over 260 complete contracts and 300 salary schedules.
- A second objective is to document the variation in contract provisions across school districts and examine factors, which may be associated with this variation. Today we will examine variation across districts based on need/resource capacity classifications.

Organization



- **Methodology**
- Compensation
- Teacher assignments and working conditions
- Professional development
- Leave provisions
- Conclusions

Methodology



- Collective bargaining agreements are complex legal documents that can cover a wide array of subjects.
- Selection of contract provisions for examination was based on four criteria:
 - Provisions with potentially significant impact on district budgets and human resource policy;
 - Provisions likely to vary significantly across districts;
 - Provisions evaluated in previous studies to allow comparison to other states;
 - Provisions that were not heavily regulated by state law. We did not look at grievance procedures for this reason.

Methodology



- PERB provided us all the contracts they had which expired in July 2007 or later.
- Districts with contracts in the sample are very similar to districts without contracts in the sample on enrollment, demographics, finances, teacher characteristics, and type of district.
- Although sample was selected non-randomly, it appears to be representative of school districts in New York (excluding New York City).

Characteristics of Districts with Contracts in Sample and Not in Sample

	Districts with Contracts in Sample	Districts without Contracts in Sample
Enrollment Variables:		
Enrollment (dcaadm)	2,738	2,631
Pupil density (pupils per square mile)	1,317	1,367
Percent LEP students	1.7	1.5
Percent of free lunch students	32.4	30.0
Financial Variables:		
Per pupil total spending	\$17,728	\$17,604
Per pupil spending on teaching	\$9,687	\$9,722
Per pupil state aid	\$6,270	\$5,826
Local property tax rate (per \$1000 of MV)	1.8	1.8
Combined wealth ratio (CWR)	1.03	1.24
Teacher Variables (all teachers):		
Salary	\$74,320	\$75,863
Total experience	32.4	32.5
Percent with graduate degree	75.8	76.6

Limitations



- Significant effort made to assure inter-coder reliability. However, there may still be some errors or omissions. Today we are presenting preliminary results from the study. Some of these results may change in future versions.
- Contract is only a partial view of district personnel policies. Other key documents, such as the PDP or health insurance plan, may not be discussed in much depth in the contract.
- A number of provisions of contracts are constrained by state law or regulations.

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Compensation



- With an emphasis on base salaries and health insurance benefits, we examined the following contract provisions:
 - How salary increases are associated with more experience and more education;
 - Whether districts use compensation as an incentive for recruitment, professional development, or retirement;

Impact of Increased Experience on Teacher Salaries Based on Contract Salary Schedule



Components	Mean	Average Variation	Need/Resource Capacity			
			Urban	Rural	Average Need	Low Need
Average (with MA):						
1 to 5	2.9%	1.6%	3.2%	2.3%	2.6%	4.7%
5 to 15	3.1%	1.2%	3.4%	2.6%	3.0%	4.0%
15 to 25	1.7%	1.3%	1.9%	2.0%	1.8%	0.8%

Impact of Increased Education on Teacher Salaries Based on Contract Salary Schedule



Education Change	Years of Experience		
	5	15	25
Average:			
BA to MA	9.4%	11.1%	12.1%
MA to PhD	15.0%	12.0%	11.7%

Impact of Increased Education on Teacher Salaries Based on Contract Salary Schedule



Need/Resource Capacity		Years of Experience		
		5	15	25
High Need Urban	BA to MA	10.9%	15.0%	18.1%
	MA to PhD	10.5%	8.8%	7.8%
High Need Rural	BA to MA	7.1%	7.0%	7.3%
	MA to PhD	11.6%	9.7%	9.5%
Average Need	BA to MA	8.7%	9.6%	9.8%
	MA to PhD	15.1%	12.3%	11.7%
Low Need	BA to MA	14.4%	20.8%	23.8%
	MA to PhD	17.1%	13.1%	13.3%

Share of Districts with Various Compensation Provisions in Their Contract



Components	Mean	Average Variation	Need/Resource Capacity			
			High Need Urban	High Need Rural	Average Need	Low Need
National Board Certification:						
Multi-year salary increase	16.3%	37.1%	9.1%	8.2%	18.4%	25.0%
Temporary bonus	4.9%	21.7%	10.0%	1.6%	6.6%	2.3%
Retirement incentives:						
Early retirement	47.5%	50.0%	36.4%	52.5%	50.0%	38.6%
Early notification of retirement	63.1%	48.3%	36.4%	75.4%	61.0%	65.9%

¹Bold and italics indicates a statistically significant difference for this variable across district types. Based on chi-square test for statistical independence for categorical variables or one-way ANOVA for continuous variables.

Health Insurance Benefits



- With an emphasis on health insurance benefits, we examined the following contract provisions:
 - Whether districts offer some type of choice in health care plans and other health benefits such as dental, vision, and flexible spending plan;
 - What share of premiums are paid by districts for regular and retired employees.

Share of Districts with Various Health Insurance Provisions in Their Contract



Components	Mean	Average Variation	Need/Resource Capacity			
			High Need Urban	High Need Rural	Average Need	Low Need
Does contract provide choice of providers? (1=yes)	33.8%	47.4%	36.4%	34.4%	35.3%	27.3%
District premium percent for regular employees:						
Individual	90.7	5.9	91.7	91.8	90.5	89.5
Family	87.3	8.6	90.1	87.7	87.1	86.3
Districts with retirement benefits for retired employees ²	55.9%	49.7%	60.0%	56.5%	54.0%	59.1%
District premium percent for retired employees:						
Individual	84.3	17.2	88.6	83.8	81.7	90.2
Family	73.8	22.7	80.0	74.7	69.8	81.2

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Teacher Assignments & Working Conditions



- In the category of teacher assignments and working conditions, we examined the following provisions of contracts:
 - The length of work year and work day, student contact time (and teaching periods), planning time, and after school commitments;
 - Limitations on class size, total students per teacher, the number of teaching assignments per day, and new class preparations per semester.

Share of Districts with Teaching Assignment and Working Condition Provisions in Their Contract

Components	Mean	Average Variation	Need/Resource Capacity			
			High Need Urban	Rural	Average Need	Low Need
Planning time in elementary school (minutes)	41.7	12.6	41.1	44.2	40.8	41.1
Does the contract provide common planning time for teachers?	19.0%	39.3%	4.5%	13.1%	22.1%	25.0%
Class size limitations:						
Firm limits	10.3%	30.4%	4.5%	9.8%	10.3%	13.6%
Guidelines	36.9%	48.3%	40.9%	31.1%	34.6%	50.0%
Number of students per teacher:						
Firm limits	12.2%	32.8%	13.6%	11.5%	11.0%	15.9%
Guidelines	7.6%	26.6%	4.5%	3.3%	8.1%	13.6%
Other limitations:						
Number of teaching assignments per day	68.1%	46.7%	77.3%	62.3%	68.4%	70.5%
Number of new preparations	25.1%	43.4%	36.4%	14.8%	24.3%	36.4%
Out-of-field teaching assignments	21.3%	41.0%	36.4%	14.8%	22.8%	18.2%

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Professional Development



- In the professional development section, we examined the following provisions of contracts:
 - Whether districts use mentoring programs
 - Number of required in-service courses or staff development days, paid leave to visit classrooms and conferences, and reimbursement of college tuition.
- Formal processes in New York reduce the need for school districts to include professional development and mentoring programs as contract provisions.

Share of Districts with Various Professional Development Provisions in Their Contract

Components	Mean	Average Variation	Need/Resource Capacity			
			High Need Urban	High Need Rural	Average Need	Low Need
Does the contract indicate:						
Number of required in-service course or staff development days	42.2%	49.5%	<i>30.0%</i>	<i>21.0%</i>	<i>46.0%</i>	<i>65.9%</i>
Whether there is paid leave to visit classrooms?	55.5%	49.8%	63.6%	55.7%	57.4%	45.5%
Whether there is paid leave to attend conferences?	72.6%	44.7%	81.8%	72.1%	71.3%	72.7%
If college tuition is reimbursed?	21.7%	41.3%	18.2%	16.4%	25.0%	20.5%
Does the contract discuss teacher mentoring programs?						
Compensation for mentors	34.6%	47.7%	18.2%	44.3%	33.1%	34.1%
Mentor selection	16.0%	36.7%	13.6%	19.7%	15.4%	13.6%
Mentor role or duties	10.6%	30.9%	9.1%	8.2%	11.0%	13.6%
Time requirements for mentoring	11.4%	31.9%	9.1%	16.4%	8.1%	15.9%

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Leave Provisions



- For leave provisions of teacher contract, we examined the following provisions of contracts:
 - Short-term leave: Number of days of sick leave and personal leave, accumulation of sick leave and personal leave days;
 - Long-term leave: Family leave and sabbatical leave.

Short-term Leave Provisions in Contract by District Type



Components	Need/Resource Capacity					
	Mean	Average Variation	High Need Urban	High Need Rural	Average Need	Low Need
Shorterm leaves:						
Number of days of leave:						
Sick leave	13.6	2.4	12.7	13.4	13.8	13.8
Personal leave	2.5	1.6	2.6	2.5	2.6	2.0
Total sick leave and personal leave	16.4	2.4	15.4	15.9	16.4	15.9
Is there a limit on accumulation of sick leave?	72.6%	44.7%	75.0%	80.6%	70.8%	65.9%
If yes, what is the maximum accumulated sick leave days	218.0	42.1	229.5	214.7	216.2	222.6
Can personal days be accumulated as sick leave?	65.8%	47.5%	81.8%	72.1%	70.6%	34.1%

*Bold and italics indicates a statistically significant difference for this variable across district types. Based on chi-square test for statistical independence for categorical variables or one-way ANOVA for continuous variables.

Long term Leave Provisions in Contract by District Type

Components	Mean	Average Variation	Need/Resource Capacity			
			High Need Urban	Rural	Average Need	Low Need
Longterm leaves:						
Does the district provide unpaid family leave?	94.7%	22.5%	90.9%	96.7%	94.1%	95.5%
If so, what is maximum time allowed?	1.8	0.5	2.0	1.7	1.8	1.9
Does the contract discuss sabbatical leave?	68.4%	46.6%	68.2%	83.6%	69.9%	43.2%
What is the salary equivalent? (percent of full time salary)	54.3%	11.4%	50.7%	52.6%	53.9%	65.7%
How many years does teacher have to return to district?	1.8	0.6	1.7	1.9	1.8	1.8
Does contract discuss what position a teacher is guaranteed upon return?	56.3%	49.7%	54.5%	68.9%	61.0%	25.0%

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Conclusions



- This study documents the similarities and differences in contents of teacher contracts for a large sample of New York school districts.
- We found that the variation across school districts was not systematically related to district enrollment size or fiscal condition. We will continue to examine whether contract provisions are related to other district characteristics.
- In the remainder of the conclusions, we discuss a few of our findings, which warrant further study.

Conclusions



- **Compensation:**

- There is significant variation in salary increments for experience and education across districts.
- On average districts provide the same salary increase for a year of experience for veteran teachers as novice teachers. This may match productivity increases but it may not reflect higher attrition rates among novice teachers.
- We found large variations in salary increments associated with increases in educational attainment across districts and teacher experience levels. An important area for further study is to examine how much these differences are related to local labor market conditions, productivity differences, or historical factors.

Conclusions



- **Compensation:**

- Close to half of districts provide incentives for early retirement. With the anticipated increase in teacher retirements in the next decade, it is important to understand how early retirement incentives relate to district human resource planning.
- We found significant differences across contracts in health care provisions for retirees. Given the potentially large future liabilities associated with retiree health care, there is need for more research examining the future cost implications of different retiree health care options.

Conclusions



- **Other findings:**

- We found significant differences in what working conditions and teacher assignment provisions are discussed in contracts and restrictive were these provisions. For example, relatively few contracts impose firm class size limits but a number discuss class size guidelines.
- With the exception of providing paid leave for conferences and school visits, relatively few districts include professional development–related provisions in their contracts. Contracts provides a very incomplete picture of district professional development activity.

Conclusions



- **Other findings:**

- We found more variation in total sick leave and personal leave days across districts than anticipated. Districts also appear to take different approaches to managing accumulated sick leave, with close to 30 percent of districts setting no limit, while other districts set limits below 200 days. Given the potentially large future liability associated with accumulated sick leave, it will be important in future research to examine in more detail how districts manage accumulated sick leave.



Thank You.

We very much welcome comments and suggestions.