

Stimulating Local Public Employment: Do General Grants Work?

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Online Appendix

This Appendix includes supplementary material to Lundqvist, Dahlberg and Mörk: “Stimulating Local Public Employment: Do General Grants Work?”

A few comments:

- Table 1: First-stage estimates when controlling for pre-determined covariates.
- Table 2: First-stage estimates when controlling for municipality fixed effects.
- Table 3: Second-stage estimates when controlling for municipality fixed effects.
- Table 4: First-stage estimates with the shorter panel—i.e., only years 2002–04 for which we have data on the number of employed in the outsourced parts of child care, schools, elderly care and social welfare. Due to the large sample reduction, the significance of the first stage is sensitive to order of polynomial and bandwidth. Therefore, we only estimate the second stage using the three widest bandwidths while controlling for out-migration linearly.
- Table 5: Effects of grants on municipal personnel using the shorter panel. That is, the main results on *public* employment, but only for years 2002–04.
- Table 6: Effects of grants on personnel in the local public welfare sector employed by a non-profit or for-profit private firm. Results obtained with data covering 2002–04.
- Table 7: Effects of grants on private school personnel. Here data covers the entire period 1996–2004, and this table presents analysis for school personnel employed by a non-profit or for-profit private firm. Since this is the full sample period and the first stage therefore is less sensitive to order of polynomial and bandwidth, various alternatives of the second stage is estimated.

Table 1: First-stage estimates when controlling for pre-determined covariates.

	<i>Full sample</i>	$h = 15$	$h = 10$	$h = 5$
$\bar{p} = 1$	4.429*** (0.615)	4.013*** (0.659)	4.348*** (0.696)	2.738*** (0.840)
$\bar{p} = 2$	3.777*** (0.687)	3.653*** (0.993)		
$\bar{p} = 3$	3.791*** (0.979)	4.473*** (1.234)		
Observations	2511	2346	2047	1241

Note: For different bandwidths, h , and order of polynomials, \bar{p} , the table reports estimates of α_1 in the first-stage equation (3) on cost-equalizing grants, when controlling for pre-determined covariates. Standard errors clustered on municipality are in parentheses. *** Significance at the 1 percent level. ** Significance at the 5 percent level. * Significance at the 10 percent level.

Data source: The SALAR.

Table 2: First-stage estimates when controlling for municipality fixed-effects.

	<i>Full sample</i>	$h = 15$	$h = 10$	$h = 5$
$\bar{p} = 1$	2.031*** (0.174)	1.923*** (0.181)	1.802*** (0.206)	1.467*** (0.257)
$\bar{p} = 2$	1.568*** (0.256)	1.294*** (0.367)		
$\bar{p} = 3$	1.119*** (0.366)	1.198*** (0.399)		
Observations	2511	2346	2047	1241

Note: For different bandwidths, h , and order of polynomials, \bar{p} , the table reports estimates of α_1 in the first-stage equation (3) on cost-equalizing grants, when controlling for municipality fixed-effects. Standard errors clustered on municipality are in parentheses. *** Significance at the 1 percent level. ** Significance at the 5 percent level. * Significance at the 10 percent level.

Data source: The SALAR.

Table 3: Effects of grants on municipal personnel when controlling for municipality fixed-effects (2SLS estimates).

		<i>Full sample</i>	<i>h = 15</i>	<i>h = 10</i>	<i>h = 5</i>
Total personnel	$\bar{p} = 1$	0.134*** (0.0475)	0.0843 (0.0529)	0.0614 (0.0625)	0.0462 (0.0956)
	$\bar{p} = 2$	-0.114 (0.101)	-0.156 (0.175)		
	$\bar{p} = 3$	-0.193 (0.213)	-0.123 (0.201)		
Administrative personnel	$\bar{p} = 1$	0.0133 (0.00836)	0.0112 (0.00939)	0.0176* (0.0106)	0.0225 (0.0160)
	$\bar{p} = 2$	0.0116 (0.0156)	0.0261 (0.0248)		
	$\bar{p} = 3$	0.0163 (0.0284)	0.0333 (0.0297)		
Child care personnel	$\bar{p} = 1$	0.00252 (0.0137)	-0.0170 (0.0148)	-0.0375** (0.0180)	-0.0179 (0.0288)
	$\bar{p} = 2$	-0.0925*** (0.0349)	-0.0897* (0.0495)		
	$\bar{p} = 3$	-0.129* (0.0686)	-0.0818 (0.0545)		
School personnel	$\bar{p} = 1$	0.0402** (0.0169)	0.0372** (0.0187)	0.0431* (0.0220)	-0.0241 (0.0426)
	$\bar{p} = 2$	0.0152 (0.0332)	-0.0408 (0.0620)		
	$\bar{p} = 3$	-0.00320 (0.0673)	-0.0267 (0.0681)		
Elderly care personnel	$\bar{p} = 1$	0.0912*** (0.0303)	0.0767** (0.0356)	0.0680 (0.0425)	0.105* (0.0564)
	$\bar{p} = 2$	0.0121 (0.0578)	0.0337 (0.0992)		
	$\bar{p} = 3$	0.00195 (0.111)	0.0252 (0.111)		
Social welfare personnel	$\bar{p} = 1$	-0.00772 (0.00617)	-0.0117* (0.00701)	-0.0140 (0.00976)	-0.0190 (0.0205)
	$\bar{p} = 2$	-0.0230* (0.0138)	-0.0323 (0.0260)		
	$\bar{p} = 3$	-0.0376 (0.0286)	-0.0287 (0.0279)		
Technical personnel	$\bar{p} = 1$	-0.00595 (0.0150)	-0.0123 (0.0171)	-0.0161 (0.0210)	-0.0259 (0.0345)
	$\bar{p} = 2$	-0.0382 (0.0296)	-0.0564 (0.0578)		
	$\bar{p} = 3$	-0.0447 (0.0636)	-0.0472 (0.0666)		
Observations		2511	2344	2045	1230

Note: For different bandwidths, h , and order of polynomials, \bar{p} , the table reports estimates of β_1 in the second-stage equation (4) when controlling for municipality fixed-effects, with the dependent variables total personnel as well as personnel disaggregated by the different sectors. The AIC-preferred polynomial is in bold. Standard errors clustered on municipality are in parentheses. *** Significance at the 1 percent level. ** Significance at the 5 percent level. * Significance at the 10 percent level.

Data source: The SALAR.

Table 4: First-stage estimates using the shorter panel.

	<i>Full sample</i>	$h = 15$	$h = 10$	$h = 5$
$\bar{p} = 1$	4.449*** (0.620)	4.097*** (0.750)	4.308*** (0.863)	1.273 (1.170)
$\bar{p} = 2$	3.828*** (0.799)	2.914 (1.855)		
$\bar{p} = 3$	2.527 (1.911)	2.845 (1.992)		
Observations	837	803	691	385

Note: For different bandwidths, h , and order of polynomials, \bar{p} , the table reports estimates of α_1 in the first-stage equation (3) on cost-equalizing grants. Standard errors clustered on municipality are in parentheses. *** Significance at the 1 percent level. ** Significance at the 5 percent level. * Significance at the 10 percent level.

Data source: The Swedish Association of Local Authorities and Regions (SALAR).

Table 5: Effects of grants on municipal personnel using the shorter panel (2SLS estimates).

	<i>Full sample</i>	$h = 15$	$h = 10$
Total personnel	0.0280 (0.0583)	-0.0998 (0.0784)	-0.0821 (0.0858)
Administrative personnel	0.0251*** (0.00551)	0.0276*** (0.00788)	0.0401*** (0.00909)
Child care personnel	-0.00762 (0.00781)	-0.0210* (0.0112)	-0.0176 (0.0144)
School personnel	-0.0180 (0.0171)	-0.0465* (0.0260)	-0.0558* (0.0325)
Elderly care personnel	0.0436 (0.0314)	-0.0285 (0.0381)	-0.0447 (0.0468)
Social welfare personnel	-0.00965** (0.00402)	-0.00367 (0.00630)	-0.00256 (0.00848)
Technical personnel	-0.00547 (0.0154)	-0.0277 (0.0210)	-0.00152 (0.0219)
Observations	837	803	691

Note: For different bandwidths, h , and order of polynomial $\bar{p} = 1$, the table reports estimates of β_1 in the second-stage equation (4), with the dependent variables total personnel as well as personnel disaggregated by the different sectors. Standard errors clustered on municipality are in parentheses. *** Significance at the 1 percent level. ** Significance at the 5 percent level. * Significance at the 10 percent level.

Data source: The SALAR.

Table 6: Effects of grants on private personnel in the local public welfare sector employed by non-profit or for-profit private firms (2SLS estimates).

	<i>Full sample</i>	$h = 15$	$h = 10$
Child care personnel	0.0113 (0.00781)	0.0261*** (0.00986)	0.0170 (0.0115)
School personnel	0.0267** (0.0131)	0.0442** (0.0178)	0.0327 (0.0210)
Elderly care personnel	-0.0134 (0.0164)	0.0317 (0.0287)	0.0327 (0.0353)
Social welfare personnel	0.00396 (0.00746)	0.00192 (0.0110)	-0.0161 (0.0139)
Observations	834	800	688

Note: For different bandwidths, h , and order of polynomial $\bar{p} = 1$, the table reports estimates of β_1 in the second-stage equation (4), with the dependent variables private personnel in child care, schools, elderly care and social welfare. Standard errors clustered on municipality are in parentheses. *** Significance at the 1 percent level. ** Significance at the 5 percent level. * Significance at the 10 percent level.

Data source: Statistics Sweden & The SALAR.

Table 7: Effects of grants on private school personnel (2SLS estimates).

		<i>Full sample</i>	$h = 15$	$h = 10$	$h = 5$
School personnel	$\bar{p} = 1$	0.0156 (0.0100)	0.0187 (0.0115)	0.0155 (0.0119)	-0.00761 (0.0177)
	$\bar{p} = 2$	0.0199 (0.0142)	-0.00483 (0.0189)		
	$\bar{p} = 3$	0.0137 (0.0168)	-0.00296 (0.0133)		
Observations		2504	2339	2040	1234

Note: For different bandwidths, h , and order of polynomials, \bar{p} , the table reports estimates of β_1 in the second-stage equation (4), with the dependent variable private school personnel. The AIC-preferred polynomial is in bold. Standard errors clustered on municipality are in parentheses. *** Significance at the 1 percent level. ** Significance at the 5 percent level. * Significance at the 10 percent level.

Data source: Statistics Sweden & The SALAR.