

## Appendix

### When Collaboration Bridges Institutions: The Impact of University–Industry Collaboration on Academic Productivity

**Table A1- The Comparison between Non-Twin Papers of Scientists with Industry Collaborators and Those without Industry Collaborators**

	POISSON MODEL	LOGIT MODEL	POISSON MODEL
	DV = NUMBER OF ACADEMIC CITATIONS RECEIVED	DV = WHETHER THE PAPER CITED IN A PATENT (=1, 0 OTHERWISE)	DV = NUMBER OF AUTHORS
	(A1-1)	(A1-2)	(A1-3)
<b>Academia–industry collaboration on the twin published in the same year (0/1)</b>	0.031 (0.154)	0.153 (0.197)	0.102 (0.086)
Twin fixed effects	Yes	Yes	Yes
Observations	447	372	447
Log-likelihood	-45572.015	-217.310	-1515.973

Robust standard errors are reported in parentheses. The level of analysis is at the twin-paper level. \*\*\* p<0.01, \*\* p<0.05, \* p<0.1

**Table A2- The Comparison of the Composition of Authorship Team within Twins**

	POISSON MODEL			
	DV = NUMBER OF FACULTY	DV = NUMBER OF RESEARCH STAFF (GRAD STUDENTS & POSTDOCS)	DV = NUMBER OF AUTHORS W/ UNIDENTIFIED STATUS	DV = NUMBER OF TOTAL PRE- DISCOVERY PUBLICATIONS OF THE AUTHORSHIP TEAM
	(A2-1)	(A2-2)	(A2-3)	(A2-4)
<b>Academia– industry collaboration (0/1)</b>	0.249 (0.170)	0.055 (0.136)	0.096 (0.127)	0.090 (0.201)
Twin fixed effects	Yes	Yes	Yes	Yes
Observations	72	72	72	72
Log-likelihood	-103.990	-82.281	-147.784	-5,299.343

Robust standard errors are reported in parentheses. The level of analysis is at the twin-paper level.

\*\*\* p<0.01, \*\* p<0.05, \* p<0.1

**Table A3- Robustness Checks with the Limited Control Set**

	POISSON MODEL					
	DV = MAIN AUTHOR'S FOLLOW-ON PAPERS	DV = MAIN AUTHOR'S CITATION- WEIGHTED FOLLOW-ON PAPERS	DV = MAIN AUTHOR'S FOLLOW-ON PAPERS	DV = MAIN AUTHOR'S CITATION- WEIGHTED FOLLOW-ON PAPERS	DV = MAIN AUTHOR'S FOLLOW-ON PAPERS	DV = MAIN AUTHOR'S CITATION- WEIGHTED FOLLOW-ON PAPERS
	(A3-1)	(A3-2)	(A3-3)	(A3-4)	(A3-5)	(A3-6)
<b>Academia-industry collaboration (0/1)</b>	0.226* (0.118)	0.267** (0.133)	-0.357 (0.277)	-0.243 (0.305)	-0.081 (0.161)	-0.086 (0.198)
<b>Academia-industry collaboration × Discovery has high commercial potential</b>			0.736** (0.300)	0.584* (0.335)		
<b>Academia-industry collaboration × Industry partner is established</b>					0.485** (0.221)	0.502** (0.249)
Log(main author's past paper count+1)	0.233*** (0.083)	0.519*** (0.083)	0.205*** (0.069)	0.506*** (0.106)	0.238*** (0.052)	0.494*** (0.097)
Main author affiliated with a U.S. institution	-0.409** (0.083)	-0.330* (0.083)	-0.402** (0.161)	-0.332 (0.204)	-0.443** (0.175)	-0.385** (0.189)
Twin fixed effects	Yes	Yes	Yes	Yes	Yes	Yes
Observations	72	72	72	72	72	72
Log likelihood	-282.218	-20,592.058	-267.057	-19,753.719	-273.451	-19,553.834
Paper-twin FE	33	33	33	33	33	33

Robust standard errors are reported in parentheses. The level of analysis is at the twin-paper level.

\*\*\* p<0.01, \*\* p<0.05, \* p<0.1