

APPENDIX – FOR ONLINE PUBLICATION

A Appendix Tables

Table A.1: Literature

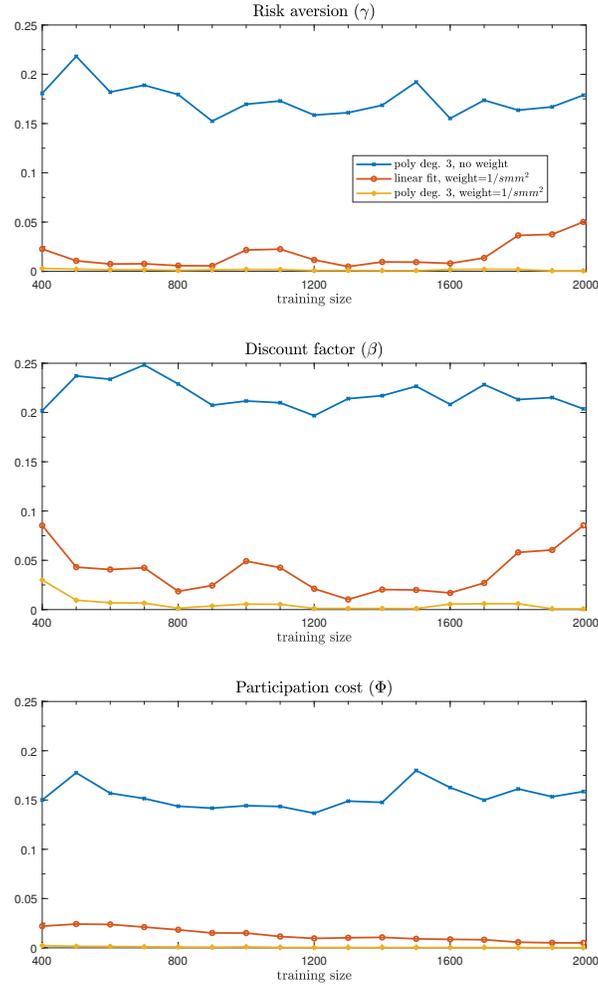
Sub-field	Year	Reference	Comparative statics	Jacobian	AGS	N/A
Investment, capital structure, and financing	1992	Whited JF				✓
	2003	Love RFE				✓
	2005	Hennessy et al. JF				✓
	2007	Hennessy et al. JF		✓		
		DeAngelo et al. JFE	✓			
	2011	Lin et al. JFE				✓
	2013	Matvos RFS				✓
	2014	Nikolov et al. JF	✓			
	2016	Warusawitharana et al. RFS	✓			
		Li et al. RFS				✓
	2017	Bakke et al. JFE	✓			
		Gu JFE				✓
	2018	Wu RFS		✓	✓	
2019	Nikolov et al. JFE	✓				
2021	Frank et al. RFS				✓	
	Begenau et al. JFE				✓	
	(Forthcoming)	Catherine et al. JF	✓	✓	✓	
Corporate governance	2009	Gayle et al. AER				✓
	2010	Taylor JF				✓
		Kang et al. JFE				✓
	2012	Coles et al. JFE		✓		
	2013	Taylor JFE				✓
	2017	Jung et al. JFE		✓		
	2018	Page JFE			✓	
2022	Bertomeu JFE				✓	
Bankruptcy	2016	Glover JFE				✓
Banking	2014	Schroth et al. JFE		✓		
Corporate control	2014	Dimopoulos et al. JFE	✓			
	2015	Albuquerque et al. JF	✓			
	2018	Li et al. JFE		✓		
	2020	Wang JFE				✓
Entrepreneurship	2020	Jones et al. AER		✓		
	2022	Ewens et al. JFE	✓			
		Catherine JFE	✓			
Household finance	2018	Pagel Econometrica				✓
	2019	Sun et al. JFE	✓			
	2020	Ameriks et al. JPE				✓
	2022	Catherine RFS				✓
Real estate	2015	Corbae et al. JPE				✓
	2017	Landvoigt RFS				✓
	2020	Oh et al. JFE				✓
	2021	Ghent JFE				✓

Figure A.1: Out-of-sample Performance with respect to Training Sample Size (Corporate Finance Model)



Notes. This figure explores the precision of the approximate SMM for the corporate finance model as a function of the size of the training sample used to fit the approximation. The y-axis reports a measure of the approximation error for estimated parameters, $1 - R^2$, calculated over an identified out-of-sample validation set described in fig. 2. The x-axis corresponds to n , the size of the training dataset \mathcal{D} used to estimate the approximation. We use the first n points of the training sample, for n starting from 1,000 to 50,000 (our benchmark approximation) in increments of 1,000. We consider three approximations: (a) a third-order polynomial approximation with no weight (blue line) (b) a linear approximation with weight $k=2$ (red line) (c) the benchmark approximation (third-order polynomial with $k=2$). We limit the illustration on the graph to a max of .25 on the y-axis, considering all cases of R^2 less than .75 as poor performance cases.

Figure A.2: Out-of-sample Performance with respect to Training Sample Size (Household Finance Model)



Notes. This figure explores the precision of the approximate SMM for the household finance model as a function of the size of the training sample used to fit the approximation. The y-axis reports a measure of the approximation error for estimated parameters, $1 - R^2$, calculated over an identified out-of-sample validation set described in fig. 10. The x-axis corresponds to n , the size of the training dataset \mathcal{D} used to estimate the approximation. We use the first n points of the training sample, for n starting from 400 to 2,000 (our benchmark approximation) in increments of 100. We consider three approximations: (a) a third-order polynomial approximation with no weight (blue line) (b) a linear approximation with weight $k=2$ (red line) (c) the benchmark approximation (third-order polynomial with $k=2$).

Table A.2: Preset parameters of life-cycle model

p_z	.136	r	.02
ρ_z	.967	θ_1	.1237
μ_z^-	-.086	θ_2	-.0125
λ_{zl}	4.291	θ_0	-3.165
σ_z^-	.562	t_0	23
σ_z^+	.037	R	65
σ_η^-	.895	T	100
σ_η^+	.089		

This table shows the calibrated parameters used in the estimation of the life-cycle model introduced in Section 4.