

Online Appendix
Does Climate Change Exposure Matter to Stakeholders?

Table A1. Climate change exposure and the costs of high leverage – New Firm ESG Measure

	Baseline Regression		Political affiliation		Paris Agreement	
	(1)	(2)	Blue States (3)	Red States (4)	Before Paris Agreement (5)	After Paris Agreement (6)
$CCEXPO_{t-2} \times HLEV_{t-2}$	-0.0145*** (-2.89)	-0.0142*** (-2.95)	-0.0087** (-2.21)	-0.0203 (-1.48)	-0.0080 (-0.85)	-0.0088* (-1.88)
$CCEXPO_{t-2}$	0.0063 (1.49)	0.0042 (1.10)	0.0040 (0.77)	0.0209* (1.92)	0.0009 (0.14)	0.0051 (0.72)
$MSCI ESG_{t-2} \times HLEV_{t-2}$	0.0083** (2.13)	0.0084** (2.11)	0.0004 (0.07)	0.0193 (1.51)	0.0098** (2.24)	0.0090 (0.91)
$MSCI ESG_{t-2}$	-0.0031 (-1.16)	-0.0047* (-1.76)	-0.0009 (-0.22)	-0.0140 (-1.45)	-0.0073*** (-2.60)	0.0120 (1.41)
$HLEV_{t-2}$	-0.0089 (-1.41)	-0.0100 (-1.57)	-0.0101 (-1.19)	-0.0220 (-1.38)	-0.0067 (-0.72)	-0.0009 (-0.08)
$SIZE_t$	0.0330*** (4.41)	0.0669*** (6.95)	0.0961*** (5.54)	0.1444*** (5.12)	0.0733*** (5.39)	0.2149*** (10.01)
$COMPETITION_t$	0.0297 (0.52)	0.0201 (0.06)	-0.0567 (-0.10)	0.2070 (0.33)	0.4215* (1.80)	-0.1368 (-0.22)
$PROFIT_{t-1}$	-0.0819*** (-3.26)	-0.1255*** (-3.32)	-0.1725*** (-3.14)	-0.0739 (-0.75)	-0.1987*** (-3.53)	-0.1793** (-2.56)
$PROFIT_{t-2}$	-0.0220 (-0.91)	-0.0453 (-1.30)	-0.0793 (-1.57)	-0.2789** (-2.41)	-0.0488 (-1.13)	-0.1465** (-2.16)
$INVESTMENT_{t-1}$	0.0552 (0.45)	0.0431 (0.38)	0.0637 (0.35)	-0.1542 (-0.63)	-0.0856 (-0.60)	0.2597 (1.15)
$INVESTMENT_{t-2}$	-0.1696 (-1.34)	-0.0237 (-0.20)	-0.0303 (-0.19)	0.1058 (0.37)	0.0562 (0.37)	0.1669 (0.78)
$SELLEXP_{t-1}$	-0.0155* (-1.34)	0.0046 (0.20)	0.0475 (0.19)	0.2345 (0.37)	0.0252 (0.37)	0.1217 (0.78)

	(-1.78)	(0.09)	(0.53)	(1.63)	(0.37)	(1.39)
<i>SELLEXP</i> _{<i>t-2</i>}	0.0190***	0.0856**	0.0050	-0.0472	0.0766	0.0495
	(2.63)	(2.14)	(0.09)	(-0.31)	(1.50)	(0.67)
<i>COGS</i> _{<i>t-1</i>}	-0.3501***	-0.3388***	-0.3223***	-0.2383***	-0.2932***	-0.4425***
	(-9.90)	(-9.11)	(-6.39)	(-2.92)	(-5.94)	(-6.43)
<i>COGS</i> _{<i>t-2</i>}	0.1777***	0.2016***	0.2519***	-0.0211	0.2337***	0.1692***
	(5.23)	(5.62)	(4.99)	(-0.27)	(5.05)	(3.04)
<i>PENALTY</i> _{<i>t-1</i>}	-0.0005	-0.0008*	-0.0005	-0.0025*	-0.0015***	-0.0003
	(-1.22)	(-1.86)	(-0.90)	(-1.88)	(-2.61)	(-0.39)
<i>PENALTY</i> _{<i>t-2</i>}	-0.0006	-0.0009**	-0.0016***	0.0004	-0.0012**	-0.0011
	(-1.47)	(-2.28)	(-3.10)	(0.31)	(-2.30)	(-1.61)
<i>CONSTANT</i>	-0.0678**	0.0621	-0.0857	-0.2911	-0.1196	-0.0344
	(-2.04)	(0.36)	(-0.23)	(-0.84)	(-0.77)	(-0.10)
Observations	10,520	10,520	4,841	2,275	6,034	4,486
R-squared	4.72%	21.86%	25.65%	40.46%	32.45%	18.18%
Year F.E.	Yes	Yes	Yes	Yes	Yes	Yes
Firm F.E.	Yes					
Industry × Firm F.E.		Yes	Yes	Yes	Yes	Yes

This table replicates the analysis in Tables 4, 5, and 6 by replacing the MSCI ESG STATS CSR score across all seven areas except corporate governance with the MSCI ESG ratings ESG score. Models 1 and 2 replicate the baseline regression in Table 4. Models 3 and 4 replicate the split sample analysis by party affiliation in Table 5. Models 5 and 6 replicate the split sample analysis by the 2015 Paris Agreement in Table 6.

Table A2. Climate change exposure and the costs of high leverage – CSR Environmental Dimension Score

	Baseline Regression		Political Affiliation		Paris Agreement	
	(1)	(2)	Blue States (3)	Red States (4)	Before Paris Agreement (5)	After Paris Agreement (6)
<i>CCEXPO</i> _{<i>t-2</i>} × <i>HLEV</i> _{<i>t-2</i>}	-0.0134*** (-3.22)	-0.0140*** (-3.22)	-0.0090** (-2.32)	-0.0026 (-0.25)	-0.0092 (-1.41)	-0.0079* (-1.78)
<i>CCEXPO</i> _{<i>t-2</i>}	0.0083*** (3.23)	0.0086*** (3.21)	0.0051 (1.50)	0.0087 (1.18)	0.0110*** (3.44)	0.0027 (0.40)
<i>CSR ENV</i> _{<i>t-2</i>} × <i>HLEV</i> _{<i>t-2</i>}	0.0059** (2.20)	0.0034 (1.19)	-0.0011 (-0.31)	0.0099 (1.65)	0.0044 (1.28)	0.0064 (1.08)
<i>CSR ENV</i> _{<i>t-2</i>}	-0.0068* (-1.91)	-0.0099*** (-2.63)	-0.0115** (-2.35)	-0.0076 (-0.77)	-0.0129*** (-3.03)	-0.0121 (-1.38)
<i>HLEV</i> _{<i>t-2</i>}	-0.0190*** (-3.93)	-0.0205*** (-4.20)	-0.0174*** (-2.78)	-0.0192* (-1.73)	-0.0228*** (-3.78)	-0.0019 (-0.16)
<i>SIZE</i> _{<i>t</i>}	0.0370*** (7.29)	0.0532*** (8.58)	0.0645*** (6.60)	0.0911*** (6.78)	0.0659*** (8.20)	0.2244*** (10.75)
<i>COMPETITION</i> _{<i>t</i>}	0.0846* (1.91)	0.1353 (0.88)	-0.0454 (-0.21)	0.3632 (1.01)	0.2037 (1.27)	0.0143 (0.02)
<i>PROFIT</i> _{<i>t-1</i>}	-0.0915*** (-4.26)	-0.0857*** (-2.97)	-0.0724** (-2.22)	-0.1185* (-1.93)	-0.0999*** (-3.28)	-0.2160*** (-2.75)
<i>PROFIT</i> _{<i>t-2</i>}	-0.0311 (-1.47)	-0.0551* (-1.92)	-0.0596 (-1.55)	-0.0389 (-0.75)	-0.0968*** (-3.02)	-0.0099 (-0.14)
<i>INVESTMENT</i> _{<i>t-1</i>}	0.1426* (1.83)	0.0750 (1.06)	-0.0206 (-0.19)	0.1450 (1.07)	0.0545 (0.72)	0.0817 (0.34)
<i>INVESTMENT</i> _{<i>t-2</i>}	-0.0885 (-1.11)	-0.0130 (-0.18)	-0.1027 (-1.07)	-0.2499* (-1.72)	-0.0218 (-0.28)	0.0357 (0.16)
<i>SELLEXP</i> _{<i>t-1</i>}	-0.0017 (-0.13)	0.0500 (1.33)	0.0534 (0.60)	-0.0312 (-0.49)	0.0912** (2.36)	0.2159* (1.78)

<i>SELLEXP</i> _{<i>t-2</i>}	0.0219*	0.0190	0.0313	0.0661	0.0291	0.0360
	(1.71)	(0.63)	(0.53)	(1.26)	(0.94)	(0.53)
<i>COGS</i> _{<i>t-1</i>}	-0.3556***	-0.3425***	-0.4131***	-0.3092***	-0.3432***	-0.4520***
	(-13.08)	(-11.94)	(-9.52)	(-5.84)	(-10.48)	(-6.55)
<i>COGS</i> _{<i>t-2</i>}	0.1600***	0.1745***	0.2246***	0.0854*	0.1747***	0.1376**
	(6.35)	(6.50)	(6.11)	(1.74)	(5.78)	(2.36)
<i>PENALTY</i> _{<i>t-1</i>}	-0.0006*	-0.0009***	-0.0006	-0.0013*	-0.0010**	-0.0006
	(-1.76)	(-2.59)	(-1.40)	(-1.72)	(-2.49)	(-0.92)
<i>PENALTY</i> _{<i>t-2</i>}	-0.0010***	-0.0011***	-0.0013***	-0.0000	-0.0010**	-0.0012*
	(-2.91)	(-3.38)	(-3.09)	(-0.05)	(-2.44)	(-1.85)
<i>CONSTANT</i>	-0.0538**	-0.0041	-0.0833	-0.4661*	0.0212	-0.0771
	(-2.37)	(-0.05)	(-0.73)	(-1.95)	(0.23)	(-0.23)
Observations	20,038	20,038	9,950	5,008	15,257	4,781
R-squared	5.16%	18.57%	16.60%	35.57%	21.10%	19.36%
Year F.E.	Yes	Yes	Yes	Yes	Yes	Yes
Firm F.E.	Yes					
Industry × Firm F.E.		Yes	Yes	Yes	Yes	Yes

This table replicates the analysis in Tables 4, 5, and 6 by replacing the MSCI ESG STATS CSR score across all seven areas except corporate governance with the MSCI ESG STATS CSR environmental area score. Models 1 and 2 replicate the baseline regression in Table 4. Models 3 and 4 replicate the split sample analysis by party affiliation in Table 5. Models 5 and 6 replicate the split sample analysis by the 2015 Paris Agreement in Table 6.

Table A3. Climate change exposure and the costs of high leverage – MSCI ESG Ratings Environmental Pillar Score

	Baseline Regression		Political Affiliation		Paris Agreement	
	(1)	(2)	Blue States (3)	Red States (4)	Before Paris Agreement (5)	After Paris Agreement (6)
$CCEXPO_{t-2} \times HLEV_{t-2}$	-0.0145*** (-2.88)	-0.0143*** (-2.97)	-0.0087** (-2.25)	-0.0196 (-1.52)	-0.0067 (-0.93)	-0.0099** (-2.11)
$CCEXPO_{t-2}$	0.0064 (1.50)	0.0044 (1.16)	0.0039 (0.77)	0.0205* (1.90)	0.0016 (0.27)	0.0054 (0.77)
$MSCI\ ENV_{t-2} \times HLEV_{t-2}$	0.0051 (1.24)	0.0056 (1.31)	0.0026 (0.42)	0.0126 (1.02)	0.0057 (1.12)	0.0128 (1.60)
$MSCI\ ENV_{t-2}$	-0.0025 (-0.89)	-0.0043 (-1.58)	-0.0014 (-0.36)	-0.0184** (-2.06)	-0.0067** (-2.05)	-0.0014 (-0.24)
$HLEV_{t-2}$	-0.0084 (-1.33)	-0.0096 (-1.52)	-0.0108 (-1.28)	-0.0225 (-1.44)	-0.0051 (-0.56)	-0.0003 (-0.03)
$SIZE_t$	0.0339*** (4.52)	0.0675*** (7.02)	0.0961*** (5.57)	0.1425*** (5.04)	0.0767*** (5.60)	0.2148*** (9.94)
$COMPETITION_t$	0.0315 (0.55)	0.0150 (0.04)	-0.0573 (-0.10)	0.1618 (0.27)	0.4272* (1.81)	-0.9927 (-1.06)
$PROFIT_{t-1}$	-0.0805*** (-3.21)	-0.1217*** (-3.25)	-0.1726*** (-3.13)	-0.0694 (-0.70)	-0.1966*** (-3.62)	-0.1995*** (-2.91)
$PROFIT_{t-2}$	-0.0272 (-1.12)	-0.0559 (-1.62)	-0.0800 (-1.58)	-0.2836** (-2.48)	-0.0734* (-1.68)	-0.1419** (-2.09)
$INVESTMENT_{t-1}$	0.0571 (0.46)	0.0495 (0.44)	0.0616 (0.34)	-0.1781 (-0.73)	-0.0579 (-0.41)	0.2776 (1.22)
$INVESTMENT_{t-2}$	-0.1708 (-1.35)	-0.0262 (-0.22)	-0.0314 (-0.19)	0.1089 (0.38)	0.1261 (0.94)	0.1663 (0.77)
$SELLEXP_{t-1}$	-0.0156* (-1.79)	0.0081 (0.15)	0.0480 (0.53)	0.2330* (1.65)	0.0184 (0.29)	0.1215 (1.37)

<i>SELLEXP</i> _{<i>t-2</i>}	0.0186*** (2.59)	0.0872** (2.17)	0.0045 (0.08)	-0.0417 (-0.28)	0.0903* (1.83)	0.0511 (0.69)
<i>COGS</i> _{<i>t-1</i>}	-0.3515*** (-9.89)	-0.3415*** (-9.13)	-0.3227*** (-6.40)	-0.2349*** (-2.90)	-0.2881*** (-5.87)	-0.4412*** (-6.29)
<i>COGS</i> _{<i>t-2</i>}	0.1792*** (5.28)	0.2052*** (5.70)	0.2519*** (4.98)	-0.0208 (-0.27)	0.2362*** (5.12)	0.1809*** (3.24)
<i>PENALTY</i> _{<i>t-1</i>}	-0.0005 (-1.22)	-0.0008* (-1.84)	-0.0005 (-0.90)	-0.0025* (-1.85)	-0.0016*** (-2.76)	-0.0002 (-0.25)
<i>PENALTY</i> _{<i>t-2</i>}	-0.0006 (-1.44)	-0.0009** (-2.22)	-0.0016*** (-3.09)	0.0005 (0.38)	-0.0012** (-2.24)	-0.0012* (-1.72)
<i>CONSTANT</i>	-0.0622* (-1.87)	0.0723 (0.41)	-0.1394 (-0.41)	-0.3668 (-1.57)	-0.1011 (-0.65)	0.4178 (0.84)
Observations	10,520	10,520	4,841	2,275	6,034	4,486
R-squared	4.75%	21.94%	25.66%	40.51%	33.10%	18.31%
Year F.E.	Yes	Yes	Yes	Yes	Yes	Yes
Firm F.E.	Yes					
Industry × Firm F.E.		Yes	Yes	Yes	Yes	Yes

This table replicates the analysis in Tables 4, 5, and 6 by replacing the MSCI ESG STATS CSR score across all seven areas except corporate governance with the MSCI ESG Ratings environmental pillar score. Models 1 and 2 replicate the baseline regression in Table 4. Models 3 and 4 replicate the split sample analysis by party affiliation in Table 5. Models 5 and 6 replicate the split sample analysis by the 2015 Paris Agreement in Table 6.

Table A4. Climate change exposure and the costs of high leverage – Strengths and Concerns

	(1)	(2)	(3)	(4)
$CCEXPO_{t-2} \times HLEV_{t-2}$	-0.0132*** (-3.23)	-0.0131*** (-3.18)	-0.0138*** (-3.22)	-0.0137*** (-3.16)
$CCEXPO_{t-2}$	0.0083*** (3.25)	0.0083*** (3.25)	0.0087*** (3.24)	0.0086*** (3.24)
$CSR_Strengths_{t-2} \times HLEV_{t-2}$	0.0070** (2.36)		0.0063** (2.13)	
$CSR_Strengths_{t-2}$	-0.0134*** (-6.20)		-0.0134*** (-6.29)	
$CSR_Concerns_{t-2} \times HLEV_{t-2}$		0.0023 (0.74)		0.0043 (1.40)
$CSR_Concerns_{t-2}$		-0.0091*** (-4.41)		-0.0113*** (-5.68)
$HLEV_{t-2}$	-0.0188*** (-3.88)	-0.0188*** (-3.89)	-0.0206*** (-4.22)	-0.0208*** (-4.28)
$SIZE_t$	0.0384*** (7.60)	0.0387*** (7.58)	0.0549*** (8.87)	0.0558*** (8.96)
$COMPETITION_t$	0.0842* (1.91)	0.0841* (1.91)	0.1279 (0.85)	0.0931 (0.60)
$PROFIT_{t-1}$	-0.0919*** (-4.28)	-0.0923*** (-4.30)	-0.0872*** (-3.01)	-0.0877*** (-3.04)
$PROFIT_{t-2}$	-0.0315 (-1.49)	-0.0318 (-1.50)	-0.0564** (-1.96)	-0.0564* (-1.96)
$INVESTMENT_{t-1}$	0.1380* (1.78)	0.1416* (1.82)	0.0693 (0.98)	0.0717 (1.01)
$INVESTMENT_{t-2}$	-0.0918 (-1.15)	-0.0913 (-1.14)	-0.0157 (-0.21)	-0.0154 (-0.21)
$SELLEXP_{t-1}$	-0.0023 (-0.18)	-0.0020 (-0.15)	0.0501 (1.33)	0.0498 (1.32)
$SELLEXP_{t-2}$	0.0220* (1.71)	0.0223* (1.73)	0.0192 (0.63)	0.0190 (0.63)
$COGS_{t-1}$	-0.3567*** (-13.11)	-0.3545*** (-13.02)	-0.3427*** (-11.95)	-0.3403*** (-11.88)
$COGS_{t-2}$	0.1581*** (6.27)	0.1611*** (6.37)	0.1728*** (6.44)	0.1756*** (6.54)
$PENALTY_{t-1}$	-0.0006* (-1.75)	-0.0006 (-1.63)	-0.0008** (-2.56)	-0.0008** (-2.41)
$PENALTY_{t-2}$	-0.0009*** (-2.76)	-0.0009*** (-2.79)	-0.0010*** (-3.23)	-0.0010*** (-3.25)
$CONSTANT$	-0.0590*** (-2.60)	-0.0561** (-2.47)	0.0041 (0.05)	0.0190 (0.23)
Observations	20,038	20,038	20,038	20,038

R-squared	5.36%	5.25%	18.76%	18.71%
<i>Firm F.E.</i>	Y	Y	Y	Y
<i>Year F.E.</i>	Y	Y		
<i>Year × Industry F.E.</i>			Y	Y

This table replicates the analysis in Table 4. We replace the MSCI ESG STATS CSR score across all seven areas except corporate governance with MSCI ESG STATS CSR strengths and concerns separately.

Table A5. Climate change exposure and the costs of high leverage: Political affiliation – Strengths and Concerns

	Blue States		Red States	
	(1)	(2)	(3)	(4)
<i>CCEXPO</i> _{<i>t-2</i>} × <i>HLEV</i> _{<i>t-2</i>}	-0.0089** (-2.35)	-0.0089** (-2.33)	-0.0021 (-0.20)	-0.0028 (-0.27)
<i>CCEXPO</i> _{<i>t-2</i>}	0.0051 (1.53)	0.0052 (1.53)	0.0088 (1.19)	0.0095 (1.27)
<i>CSR_Strengths</i> _{<i>t-2</i>} × <i>HLEV</i> _{<i>t-2</i>}	0.0075** (1.99)		0.0089 (1.27)	
<i>CSR_Strengths</i> _{<i>t-2</i>}	-0.0144*** (-5.60)		-0.0155*** (-2.88)	
<i>CSR_Concerns</i> _{<i>t-2</i>} × <i>HLEV</i> _{<i>t-2</i>}		0.0038 (1.10)		0.0037 (0.51)
<i>CSR_Concerns</i> _{<i>t-2</i>}		-0.0106*** (-4.17)		-0.0128*** (-2.92)
<i>HLEV</i> _{<i>t-2</i>}	-0.0193*** (-3.01)	-0.0187*** (-3.01)	-0.0172 (-1.53)	-0.0182 (-1.61)
<i>SIZE</i> _{<i>t</i>}	0.0673*** (6.87)	0.0674*** (6.92)	0.0928*** (6.92)	0.0949*** (6.94)
<i>COMPETITION</i> _{<i>t</i>}	-0.0523 (-0.25)	-0.0904 (-0.43)	0.3155 (0.88)	0.2805 (0.79)
<i>PROFIT</i> _{<i>t-1</i>}	-0.0746** (-2.29)	-0.0737** (-2.26)	-0.1201* (-1.95)	-0.1215** (-1.98)
<i>PROFIT</i> _{<i>t-2</i>}	-0.0610 (-1.57)	-0.0604 (-1.53)	-0.0376 (-0.73)	-0.0415 (-0.80)
<i>INVESTMENT</i> _{<i>t-1</i>}	-0.0283 (-0.26)	-0.0190 (-0.17)	0.1353 (1.00)	0.1331 (0.98)
<i>INVESTMENT</i> _{<i>t-2</i>}	-0.0994 (-1.03)	-0.0902 (-0.93)	-0.2568* (-1.77)	-0.2594* (-1.79)
<i>SELLEXP</i> _{<i>t-1</i>}	0.0533 (0.60)	0.0536 (0.60)	-0.0307 (-0.49)	-0.0286 (-0.45)
<i>SELLEXP</i> _{<i>t-2</i>}	0.0309 (0.52)	0.0286 (0.49)	0.0626 (1.18)	0.0627 (1.20)
<i>COGS</i> _{<i>t-1</i>}	-0.4119*** (-9.49)	-0.4108*** (-9.59)	-0.3116*** (-5.90)	-0.3042*** (-5.73)
<i>COGS</i> _{<i>t-2</i>}	0.2219*** (6.03)	0.2252*** (6.10)	0.0876* (1.79)	0.0905* (1.84)
<i>PENALTY</i> _{<i>t-1</i>}	-0.0006 (-1.36)	-0.0005 (-1.27)	-0.0013* (-1.74)	-0.0012 (-1.59)
<i>PENALTY</i> _{<i>t-2</i>}	-0.0012*** (-3.02)	-0.0012*** (-3.05)	-0.0000 (-0.03)	0.0000 (0.06)
<i>CONSTANT</i>	-0.0885	-0.0683	-0.4507*	-0.4273*

	(-0.79)	(-0.60)	(-1.90)	(-1.80)
Observations	9,950	9,950	5,008	5,008
R-squared	16.88%	16.74%	35.71%	35.71%
<i>Firm F.E.</i>	Y	Y	Y	Y
<i>Year × Industry F.E.</i>	Y	Y	Y	Y

This table replicates the analysis in Table 5. We replace the MSCI ESG STATS CSR score across all seven areas except corporate governance with MSCI ESG STATS CSR strengths and concerns separately.

Table A6. Climate change exposure and the costs of high leverage: Paris Agreement –Strengths and Concerns

	Before Paris Agreement		After Paris Agreement	
	(1)	(2)	(3)	(4)
<i>CCEXPO</i> _{<i>t-2</i>} × <i>HLEV</i> _{<i>t-2</i>}	-0.0091 (-1.39)	-0.0086 (-1.33)	-0.0075* (-1.69)	-0.0080* (-1.78)
<i>CCEXPO</i> _{<i>t-2</i>}	0.0110*** (3.45)	0.0109*** (3.41)	0.0026 (0.40)	0.0029 (0.44)
<i>CSR_Strengths</i> _{<i>t-2</i>} × <i>HLEV</i> _{<i>t-2</i>}	0.0088** (2.49)		0.0062 (0.95)	
<i>CSR_Strengths</i> _{<i>t-2</i>}	-0.0146*** (-6.38)		-0.0062 (-1.04)	
<i>CSR_Concerns</i> _{<i>t-2</i>} × <i>HLEV</i> _{<i>t-2</i>}		0.0034 (1.01)		0.0207 (1.42)
<i>CSR_Concerns</i> _{<i>t-2</i>}		-0.0099*** (-4.76)		-0.0152 (-1.33)
<i>HLEV</i> _{<i>t-2</i>}	-0.0241*** (-4.04)	-0.0239*** (-3.98)	0.0040 (0.36)	0.0047 (0.43)
<i>SIZE</i> _{<i>t</i>}	0.0672*** (8.39)	0.0677*** (8.38)	0.2233*** (10.69)	0.2226*** (10.59)
<i>COMPETITION</i> _{<i>t</i>}	0.1931 (1.20)	0.1673 (1.04)	-0.0066 (-0.01)	-0.0320 (-0.05)
<i>PROFIT</i> _{<i>t-1</i>}	-0.1019*** (-3.34)	-0.1016*** (-3.35)	-0.2142*** (-2.72)	-0.2178*** (-2.76)
<i>PROFIT</i> _{<i>t-2</i>}	-0.0984*** (-3.08)	-0.0981*** (-3.05)	-0.0114 (-0.16)	-0.0110 (-0.15)
<i>INVESTMENT</i> _{<i>t-1</i>}	0.0513 (0.68)	0.0540 (0.72)	0.0777 (0.32)	0.0841 (0.35)
<i>INVESTMENT</i> _{<i>t-2</i>}	-0.0231 (-0.29)	-0.0222 (-0.28)	0.0381 (0.17)	0.0430 (0.19)
<i>SELLEXP</i> _{<i>t-1</i>}	0.0910** (2.36)	0.0910** (2.36)	0.2141* (1.75)	0.2125* (1.75)
<i>SELLEXP</i> _{<i>t-2</i>}	0.0285 (0.92)	0.0292 (0.94)	0.0385 (0.57)	0.0369 (0.54)
<i>COGS</i> _{<i>t-1</i>}	-0.3445*** (-10.53)	-0.3420*** (-10.42)	-0.4540*** (-6.57)	-0.4531*** (-6.57)
<i>COGS</i> _{<i>t-2</i>}	0.1722*** (5.71)	0.1749*** (5.78)	0.1350** (2.31)	0.1358** (2.32)
<i>PENALTY</i> _{<i>t-1</i>}	-0.0010** (-2.47)	-0.0010** (-2.42)	-0.0006 (-0.88)	-0.0006 (-0.87)
<i>PENALTY</i> _{<i>t-2</i>}	-0.0009** (-2.32)	-0.0009** (-2.40)	-0.0012* (-1.85)	-0.0012* (-1.83)
<i>CONSTANT</i>	0.0351	0.0441	-0.0880	-0.0710

	(0.37)	(0.47)	(-0.26)	(-0.21)
Observations	15,257	15,257	4,781	4,781
R-squared	21.29%	21.20%	19.33%	19.35%
<i>Firm F.E.</i>	Y	Y	Y	Y
<i>Year × Industry F.E.</i>	Y	Y	Y	Y

This table replicates the analysis in Table 6. We replace the MSCI ESG STATS CSR score across all seven areas except corporate governance with MSCI ESG STATS CSR strengths and concerns separately.

Table A7. Climate change exposure and the costs of high leverage – Environmental Strengths and Concerns

	(1)	(2)	(3)	(4)
$CCEXPO_{t-2} \times HLEV_{t-2}$	-0.0134*** (-3.25)	-0.0129*** (-3.11)	-0.0140*** (-3.24)	-0.0136*** (-3.14)
$CCEXPO_{t-2}$	0.0083*** (3.25)	0.0082*** (3.19)	0.0086*** (3.24)	0.0086*** (3.21)
$CSR\ ENV_Strengths_{t-2} \times HLEV_{t-2}$	0.0066** (2.29)		0.0044 (1.47)	
$CSR\ ENV_Strengths_{t-2}$	-0.0109*** (-2.83)		-0.0152*** (-3.81)	
$CSR\ ENV_Concerns_{t-2} \times HLEV_{t-2}$		-0.0003 (-0.10)		0.0005 (0.20)
$CSR\ ENV_Concerns_{t-2}$		-0.0141** (-2.34)		-0.0195*** (-2.94)
$HLEV_{t-2}$	-0.0196*** (-4.02)	-0.0183*** (-3.80)	-0.0208*** (-4.24)	-0.0203*** (-4.17)
$SIZE_t$	0.0372*** (7.34)	0.0378*** (7.43)	0.0536*** (8.66)	0.0543*** (8.70)
$COMPETITION_t$	0.0836* (1.89)	0.0914** (2.07)	0.1327 (0.87)	0.1205 (0.79)
$PROFIT_{t-1}$	-0.0914*** (-4.25)	-0.0910*** (-4.24)	-0.0860*** (-2.97)	-0.0859*** (-2.98)
$PROFIT_{t-2}$	-0.0308 (-1.46)	-0.0304 (-1.44)	-0.0556* (-1.93)	-0.0544* (-1.89)
$INVESTMENT_{t-1}$	0.1420* (1.82)	0.1404* (1.80)	0.0738 (1.04)	0.0696 (0.98)
$INVESTMENT_{t-2}$	-0.0903 (-1.13)	-0.0924 (-1.15)	-0.0148 (-0.20)	-0.0173 (-0.23)
$SELLEXP_{t-1}$	-0.0016 (-0.12)	-0.0018 (-0.14)	0.0500 (1.33)	0.0501 (1.33)
$SELLEXP_{t-2}$	0.0218* (1.70)	0.0218* (1.70)	0.0191 (0.63)	0.0191 (0.63)
$COGS_{t-1}$	-0.3562*** (-13.08)	-0.3539*** (-12.98)	-0.3426*** (-11.94)	-0.3402*** (-11.85)
$COGS_{t-2}$	0.1599*** (6.35)	0.1617*** (6.38)	0.1746*** (6.51)	0.1761*** (6.54)
$PENALTY_{t-1}$	-0.0006* (-1.74)	-0.0006* (-1.71)	-0.0009** (-2.56)	-0.0008** (-2.48)
$PENALTY_{t-2}$	-0.0010*** (-2.87)	-0.0010*** (-2.87)	-0.0011*** (-3.33)	-0.0011*** (-3.31)
$CONSTANT$	-0.0583** (-2.58)	-0.0573** (-2.50)	-0.0058 (-0.07)	0.0011 (0.01)

Observations	20,038	20,038	20,038	20,038
R-squared	5.18%	5.16%	18.61%	18.58%
<i>Firm F.E.</i>	Y	Y	Y	Y
<i>Year F.E.</i>	Y	Y		
<i>Year × Industry F.E.</i>			Y	Y

This table replicates the analysis in Table 4. We replace the MSCI ESG STATS CSR score across all seven areas except corporate governance with MSCI ESG STATS CSR environmental area strengths and concerns separately.

Table A8. Climate change exposure and the costs of high leverage: Political affiliation – Environmental Strengths and Concerns

	Blue States		Red States	
	(1)	(2)	(3)	(4)
$CCEXPO_{t-2} \times HLEV_{t-2}$	-0.0092** (-2.38)	-0.0088** (-2.25)	-0.0021 (-0.20)	-0.0030 (-0.29)
$CCEXPO_{t-2}$	0.0051 (1.53)	0.0051 (1.51)	0.0085 (1.16)	0.0097 (1.31)
$CSR\ ENV\ Strengths_{t-2} \times HLEV_{t-2}$	-0.0013 (-0.37)		0.0137** (1.97)	
$CSR\ ENV\ Strengths_{t-2}$	-0.0165*** (-3.28)		-0.0181* (-1.88)	
$CSR\ ENV\ Concerns_{t-2} \times HLEV_{t-2}$		-0.0010 (-0.30)		0.0037 (0.63)
$CSR\ ENV\ Concerns_{t-2}$		-0.0202** (-2.53)		-0.0240 (-1.50)
$HLEV_{t-2}$	-0.0169*** (-2.66)	-0.0180*** (-2.89)	-0.0218* (-1.92)	-0.0174 (-1.54)
$SIZE_t$	0.0650*** (6.67)	0.0659*** (6.72)	0.0915*** (6.83)	0.0930*** (6.77)
$COMPETITION_t$	-0.0477 (-0.23)	-0.0603 (-0.28)	0.3642 (1.01)	0.3207 (0.90)
$PROFIT_{t-1}$	-0.0735** (-2.26)	-0.0713** (-2.18)	-0.1167* (-1.88)	-0.1190* (-1.93)
$PROFIT_{t-2}$	-0.0603 (-1.57)	-0.0572 (-1.47)	-0.0401 (-0.77)	-0.0376 (-0.73)
$INVESTMENT_{t-1}$	-0.0222 (-0.20)	-0.0269 (-0.24)	0.1478 (1.10)	0.1357 (1.00)
$INVESTMENT_{t-2}$	-0.1008 (-1.05)	-0.0970 (-1.00)	-0.2537* (-1.75)	-0.2635* (-1.81)
$SELLEXP_{t-1}$	0.0530 (0.59)	0.0540 (0.61)	-0.0315 (-0.50)	-0.0283 (-0.45)
$SELLEXP_{t-2}$	0.0312 (0.53)	0.0298 (0.51)	0.0657 (1.26)	0.0659 (1.26)
$COGS_{t-1}$	-0.4131*** (-9.51)	-0.4104*** (-9.50)	-0.3110*** (-5.88)	-0.3061*** (-5.80)
$COGS_{t-2}$	0.2241*** (6.12)	0.2259*** (6.12)	0.0879* (1.80)	0.0913* (1.84)
$PENALTY_{t-1}$	-0.0006 (-1.39)	-0.0006 (-1.32)	-0.0013* (-1.75)	-0.0012 (-1.60)
$PENALTY_{t-2}$	-0.0013*** (-3.09)	-0.0013*** (-3.07)	-0.0000 (-0.06)	0.0000 (0.05)
$CONSTANT$	-0.0848	-0.0848	-0.4478*	-0.4532*

	(-0.74)	(-0.74)	(-1.88)	(-1.92)
Observations	9,950	9,950	5,008	5,008
R-squared	16.68%	16.59%	35.64%	35.59%
<i>Firm F.E.</i>	Y	Y	Y	Y
<i>Year × Industry F.E.</i>	Y	Y	Y	Y

This table replicates the analysis in Table 5. We replace the MSCI ESG STATS CSR score across all seven areas except corporate governance with MSCI ESG STATS CSR environmental area strengths and concerns separately.

Table A9. Climate change exposure and the costs of high leverage: Paris Agreement – Environmental Strengths and Concerns

	Before Paris Agreement		After Paris Agreement	
	(1)	(2)	(3)	(4)
$CCEXPO_{t-2} \times HLEV_{t-2}$	-0.0091 (-1.40)	-0.0085 (-1.31)	-0.0080* (-1.80)	-0.0080* (-1.79)
$CCEXPO_{t-2}$	0.0109*** (3.42)	0.0108*** (3.37)	0.0029 (0.43)	0.0028 (0.42)
$CSR\ ENV\ Strengths_{t-2} \times HLEV_{t-2}$	0.0041 (1.13)		0.0074 (1.32)	
$CSR\ ENV\ Strengths_{t-2}$	-0.0180*** (-4.09)		-0.0114 (-1.28)	
$CSR\ ENV\ Concerns_{t-2} \times HLEV_{t-2}$		-0.0002 (-0.05)		0.0002 (0.00)
$CSR\ ENV\ Concerns_{t-2}$		-0.0133* (-1.70)		-0.0256 (-0.44)
$HLEV_{t-2}$	-0.0235*** (-3.93)	-0.0236*** (-3.91)	-0.0018 (-0.16)	0.0043 (0.25)
$SIZE_t$	0.0661*** (8.25)	0.0663*** (8.22)	0.2247*** (10.77)	0.2225*** (10.60)
$COMPETITION_t$	0.1990 (1.24)	0.1911 (1.19)	0.0195 (0.03)	0.0209 (0.03)
$PROFIT_{t-1}$	-0.1000*** (-3.28)	-0.0998*** (-3.29)	-0.2152*** (-2.73)	-0.2155*** (-2.73)
$PROFIT_{t-2}$	-0.0972*** (-3.03)	-0.0960*** (-2.99)	-0.0090 (-0.12)	-0.0106 (-0.14)
$INVESTMENT_{t-1}$	0.0532 (0.71)	0.0522 (0.69)	0.0829 (0.35)	0.0811 (0.33)
$INVESTMENT_{t-2}$	-0.0229 (-0.29)	-0.0239 (-0.30)	0.0359 (0.16)	0.0390 (0.17)
$SELLEXP_{t-1}$	0.0912** (2.36)	0.0914** (2.36)	0.2158* (1.78)	0.2124* (1.74)
$SELLEXP_{t-2}$	0.0291 (0.93)	0.0292 (0.94)	0.0378 (0.56)	0.0377 (0.55)
$COGS_{t-1}$	-0.3438*** (-10.49)	-0.3415*** (-10.40)	-0.4522*** (-6.56)	-0.4538*** (-6.56)
$COGS_{t-2}$	0.1744*** (5.76)	0.1754*** (5.79)	0.1373** (2.35)	0.1350** (2.28)
$PENALTY_{t-1}$	-0.0010** (-2.46)	-0.0010** (-2.47)	-0.0006 (-0.91)	-0.0006 (-0.84)
$PENALTY_{t-2}$	-0.0009** (-2.38)	-0.0010** (-2.44)	-0.0012* (-1.86)	-0.0012* (-1.84)
$CONSTANT$	0.0220	0.0308	-0.0833	-0.1066

	(0.24)	(0.33)	(-0.25)	(-0.32)
Observations	15,257	15,257	4,781	4,781
R-squared	21.15%	21.07%	19.37%	19.30%
<i>Firm F.E.</i>	Y	Y	Y	Y
<i>Year × Industry F.E.</i>	Y	Y	Y	Y

This table replicates the analysis in Table 6. We replace the MSCI ESG STATS CSR score across all seven areas except corporate governance with MSCI ESG STATS CSR environmental area strengths and concerns separately.