Online Supplemental Material

Overview

This SOM-R contains the following information:

Measures
- Implicit theories of intelligence
- Daily negative stress, threat appraisals, negative intelligence attribution

Methods
- Saliva sampling procedures
- Hormone assay procedures
- Cortisol data transformation
- Grades change data transformation
- Daily negative event coding

Supplementary Analyses
- **Table S1.**   Demographic characteristics.
- **Table S2.**   Attrition analysis for hormone assessments, in School 1.
- **Table S3.**   Daily hormone sampling participation rate.

Part 1 Between-Person Effects Supplementary Analyses

- **Table S4.**   The expanded regression table for primary between-person effects (in Part 1) on daily cortisol levels reported in Table 3, Model I, with coefficients for covariates that were suppressed in the main text for efficiency reasons.

- **Table S5.**   The primary between-person random intercept model predicting daily cortisol levels tested separately for each of the two schools (in Part 1).

- **Table S6.**   A random intercept model showing that the primary between-person interaction predicting daily cortisol levels does not significantly differ across the two schools (in Part 1).

- **Table S7.**   Random intercept models showing that absolute GPAs in 9th grade do not moderate the association of implicit theories of intelligence with daily cortisol levels, unlike changes in grades in 9th grade tested in the models above (in Part 1).

- **Table S8.**   An exploratory random intercept model showing that implicit theories of intelligence interact with grades change marginally significantly more strongly to predict daily cortisol levels when students report higher average intensity of academic stressors, but not higher average intensity of social stressors (in Part 1).

- **Table S9.**   The expanded regression table for between-person effects (in Part 1) on self-reports, with coefficients for covariates that were suppressed in the main text for efficiency reasons.

- **Table S10.**   Random intercept models showing that the between-person interactions predicting self-reports do not significantly differ across the two schools (in Part 1).

- **Table S11.**   Permutation tests showing that the between-person effects are unlikely to have appeared due to chance (in Part 1).

Part 2 Within-Person Effects Supplementary Analyses

- **Table S12.**   Supplementary within-person random slope models showing that more fully modeling the random intercept does not produce the cross-level interaction results that differ from what is reported in Table 4 in the main text; note that the level 2 predictors of the random intercept differ from the primary model because within-person analyses use a different subset of data due to listwise deletion (in Part 2).

- **Table S13.**   Within-person random slope models summarized in the main text which show that there are no significant interactions between implicit theories of intelligence and the intensity of previous day's academic stressors predicting the current day's self-reported negative stress and threat appraisals (in Part 2).

Measures

Implicit Theories of Intelligence (Blackwell, Trzesniewski, & Dweck, 2007)

How much do you agree or disagree with this statement?

1. You can learn new things, but you can't really change your basic intelligence.

2. Your intelligence is something you can't change very much.

3. You have a certain amount of intelligence, and you really can't do much to change it.

4. No matter who you are, you can change your intelligence a lot (*reversed*).

5. No matter how much intelligence you have, you can always change it a good amount (*reversed*).

6. You can always greatly change how intelligent you are (*reversed*).

1	2	3	4	5	6
Strongly Disagree	Disagree	Mostly Disagree	Mostly Agree	Agree	Strongly Agree

Note: In School 1, all 6 items were administered. In School 2, item 1-4 were administered due to space limit. Cronbach's alpha = .84.

Daily Negative Stress

Overall, how stressful is your day today in school so far?

1	2	3	4	5	6	7	8	9	10
Not at all stressful									Extremely stressful

Note: In School 2, a 7-point scale was used, and the responses were linearly transformed to the 10-point scale above.

Daily Threat Appraisals

Overall, how confident are you that you can handle the stresses you experienced today in school so far?

1	2	3	4	5	6	7	8	9	10
I can't handle the stress at all									I can handle all of the stress really well

Note: The response was reversed, so higher values indicate greater daily threat appraisals (1= *I can handle all of the stress really well* ~ 10= *I can't handle the stress at all*). In School 2, a 7-point scale was used, and the responses were linearly transformed to the 10-point scale above.

Daily Negative Intelligence Attributions

Read each different thought and feeling, and tell us how much you thought it or felt it today.

	1	2	3	4	5
Dumb	Not at all	A little bit	A moderate amount	A lot	A great deal
Smart*	Not at all	A little bit	A moderate amount	A lot	A great deal

Note: The same 5-point scale was used in School 1 and 2. The item "smart" was reversed to compute a composite score with two items. Higher values indicate greater negative intelligence attribution (feeling "dumb" and not "smart").

Methods

1.Saliva Sampling Procedures

School 1

Saliva samples were collected over six days of assessments in school computer labs. To minimize contaminating factors of endocrine products, students were asked to refrain from (1) eating yogurt and other dairy products; (2) drinking caffeinated beverages (i.e., coffee, soda, tea, and energy drinks); and (3) taking non-prescribed medications 2 hours prior to the assessment. One hour before the assessment, participants were asked not to engage in strenuous physical exercise. All these activities are known to affect hormone levels (Adam & Kumari, 2009; Hibel, Granger, Cicchetti, & Rogosch, 2007; Kelly, Young, Sweeting, Fischer, & West, 2008; Kirschbaum & Hellhammer, 1994; Lovallo et al., 2005). However, in case students did not follow the instructions, a daily intake survey was taken to check individual students' behavioral compliance. Very few students were in non-compliance, and excluding the non-complying students did not improve the predictive validity of cortisol levels.

On the day of daily hormone assessments, research assistants set up the rooms by placing a 2.5ml Salicap tube along with a sanitary vile and napkins. Nametags were also placed on the individual seating to easily identify students' name for sample ID verification purpose. Those who did not consent to participate in hormone assessment were assigned to sit in the first few rows of the classroom to maintain undisruptive classroom climate during the sampling procedures. Cardboard dividers were set up between seats in order to minimize potential psychological discomfort in a large classroom setting. Once room setup is complete, students were invited to the computer lab for daily hormone assessment. Prior to collecting the saliva samples, participants were given verbal instructions about how to provide saliva samples. These verbal instructions were repeated each day of assessment to ensure that all activities could be efficiently and accurately completed within a brief time window.

Participating students were instructed to transfer at least 1.5ml saliva using a sanitary vile. Once the Salicap tube was filled, they were asked to close the Salicap tube tightly and then tap the tube mildly to remove bubbles inside. Next, when students raised their hand, a pair of research assistants checked the sample tube in terms of whether it contained a sufficient level of saliva and then ensured it was tightly closed before attaching a 3-digit numeric ID label on the tube. Same random IDs were consistently used within individuals across different days of assessment for sample tracking purpose. If any samples were missing, research assistants confirmed whether it was due to absences, transfer, or withdrawal. Students who completed saliva sampling were offered hand sanitizers and napkins. After the hormone assessment, participants completed a brief daily intake survey with regard to eating, drinking, exercise, sleep and wakeup patterns of the day. For female participants, a few more questionnaires were added to examine their menstrual cycles that can affect neuroendocrine reactivity. All these activities were conducted in about ~15 minutes each day. Students were thanked and dismissed to their regular classroom.

As soon as saliva sampling was completed, the obtained saliva samples were kept in a sanitary Ziploc bag per each classroom and stored in a laboratory freezer located in the school at −20°C. In the following week, research assistants carefully re-confirmed all of the random ID labels and shipped the samples with dry ice.

School 2

Two research assistants were assigned to each classroom and gave verbal instructions in front of the entire classroom. Students were informed that participation is voluntary and they can discontinue at any point of the study. Students who did not consent to the study or chose to withdraw were guided to work on their homework or reading to ensure a quiet environment to complete study activities. After completing the daily survey and saliva sampling, students were thanked and dismissed. The same procedures were implemented in both baseline and post-election day assessments.

Saliva samples were collected in school computer labs or classrooms: the day of comprehensive student self-report survey (Monday or Tuesday, depending on course schedules), and Monday through Friday over 10 days in four weeks after the first sampling day. Students were asked to refrain from (1) eating yogurt and other dairy products; (2) drinking caffeinated beverages (i.e., coffee, soda, tea, and energy drinks); (3) engaging in strenuous physical activities, like exercise; and (4) taking non-prescribed medications a minimum 1 hour prior to sample collection. Students reported these behaviors on a daily intake questionnaire.

On the day of saliva collection, research assistants set up the rooms by passing out a small bag containing a 4ml Salicap tube, a straw, and napkins. Once room setup was complete, students were invited to the computer lab for saliva sampling and self-report questionnaire. Prior to collecting the saliva samples, participants were given verbal instructions as what follows:

> "HI everyone- Today we have two brief activities: saliva sampling and a brief survey. Take out the sample tube and straw from your Ziploc bag. Unscrew the cap from the tube. Let saliva pool underneath your tongue. Once you have pooled a small amount of saliva, transfer it into the tube using the straw. Try to fill half of the tube—which is about 2 ml. Once you are done, please screw the cap back on the tube tightly to protect against spills. When you're finished, please raise your hand, and we will come pick up your sample. After saliva sampling, you will complete a brief online survey. Read the instructions carefully and do your best to answer all of the questions to the best of your ability. Now please begin by providing a saliva sample. If you do not know your ID, raise your hand and we will look it up for you. If you have trouble logging into the survey, please raise your hand. Now please begin."

When students raised their hand, a pair of research assistants checked the sample tube whether it contained a sufficient level of saliva and then ensured it was completely closed before attaching a 3-digit numeric sample ID label sticker on the tube. Same random IDs were consistently used within individuals across days for sample tracking purpose. If any samples were missing, research assistants confirmed whether it was due to absences, transfer, or withdrawal. Students who completed saliva sampling were offered hand sanitizers and napkins.

After the hormone assessments, participants completed a brief daily intake survey with regard to eating, drinking, exercise, sleep and wakeup patterns of the day. For female participants, the hormone intake survey asked extra questions for their menstrual cycles. All these activities were conducted in about 15 minutes each day. Students were thanked and dismissed to their regular classroom.

As soon as saliva sampling was completed, the obtained saliva samples were kept in a sanitary Ziploc bag per each classroom and kept in a Yeti icebox until the session ends. Soon after, samples were transported to a laboratory freezer and kept at −80°C.


2.Hormone Assay

School 1

Salivary cortisol was assayed using a competitive chemiluminescence immunoassay (CLIA) method with high sensitivity. All samples were pipetted either by a Hamilton Company liquid handling robot, or by carefully trained and supervised personnel. All samples were measured in duplicate, and the samples with a coefficient of variation (CV) > 10% were repeated. In addition, the samples that were above or below the highest or lowest standard concentration were repeated, with high samples being diluted in adequate diluent until results were within the standard range. The cortisol assay has a sensitivity of 0.138 nmol/l, with intra- and inter-assay coefficient of variation of 4.64 and 7.98%, respectively.

School 2

Saliva samples were assayed by two assay labs: Brandeis University Biological Health Psychology Laboratory led by Drs. Nicolas Rohleder and Jutta Wolf; Social Neuroendocrinology Laboratory at University of Texas at Austin led by Dr. Robert Josephs. To determine circulating cortisol concentration levels, luminescence immunoassay methods (IBL International, Germany) and enzyme immunoassay (DRG International, USA) methods were utilized. All samples were measured in duplicate, and samples with a coefficient of variation (CV) > 10% were repeated. The cortisol assay has intra- and inter-assay coefficient of variation of 9.28% and 15.5%, respectively.

3. Cortisol Data Transformation

To improve non-normal distribution of raw cortisol values, we first trimmed extreme outliers (top and bottom 2%) and then separated them by school and by assay lab batches. The outliers-trimmed cortisol variable was then transformed with a square-root. In the model analyses, we re-scaled the square-root transformed cortisol variable with the raw mean and standard deviation. Histograms of transformed and untransformed cortisol values are shown below, by school.

School 1
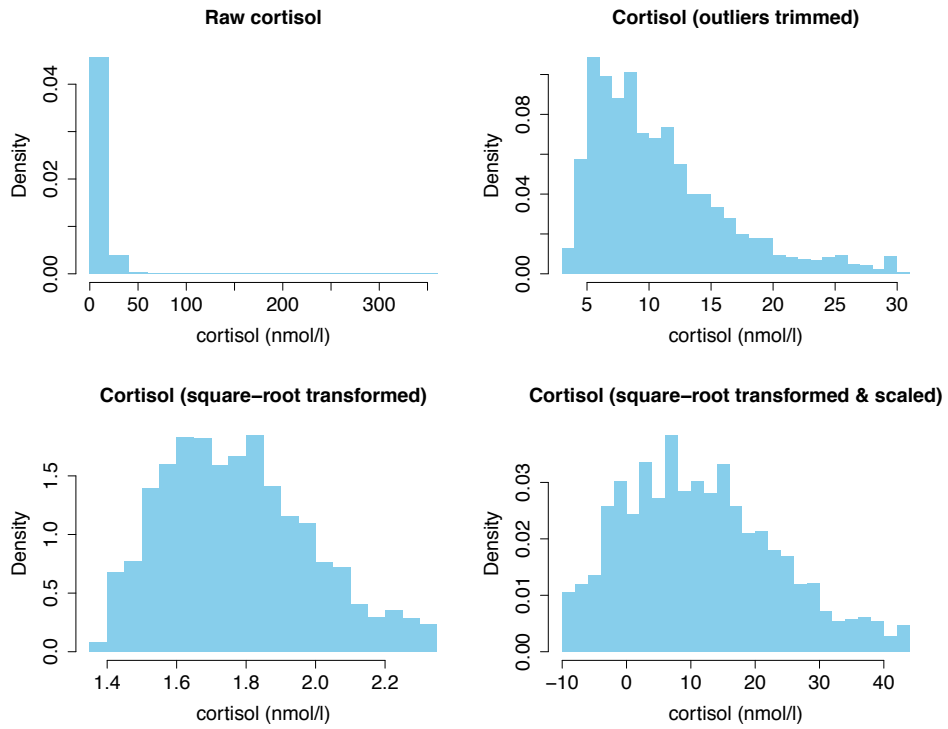
School 2
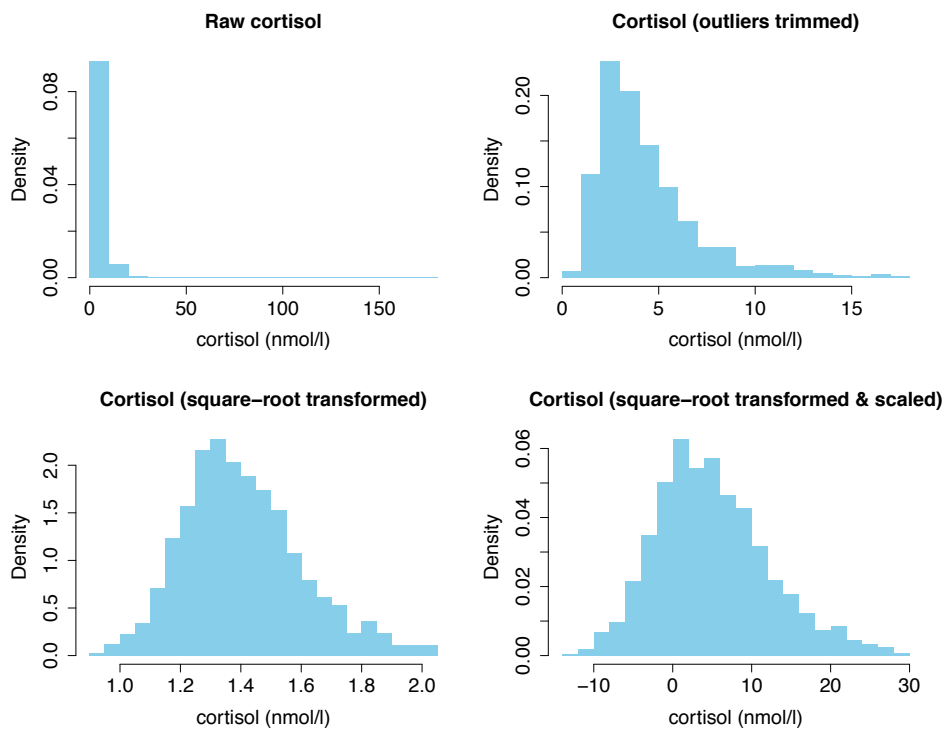
Cortisol Levels by Sampling Time of Day

This graph shows the random effects of time of day on salivary cortisol concentration (nmol/l; within-school z-scored), by school. A Loess smooth curve was fitted for each school. Based on graphical inspection, in all multilevel mixed-effects model analyses, we used a step-function by entering three linear predictors of time of day covariates (8 a.m. to 10 a.m.; 10 a.m. to 14 p.m.; and after 14 p.m.).

Salivary Cortisol (nmol/l) by Time of Day, In School 1 and School 2
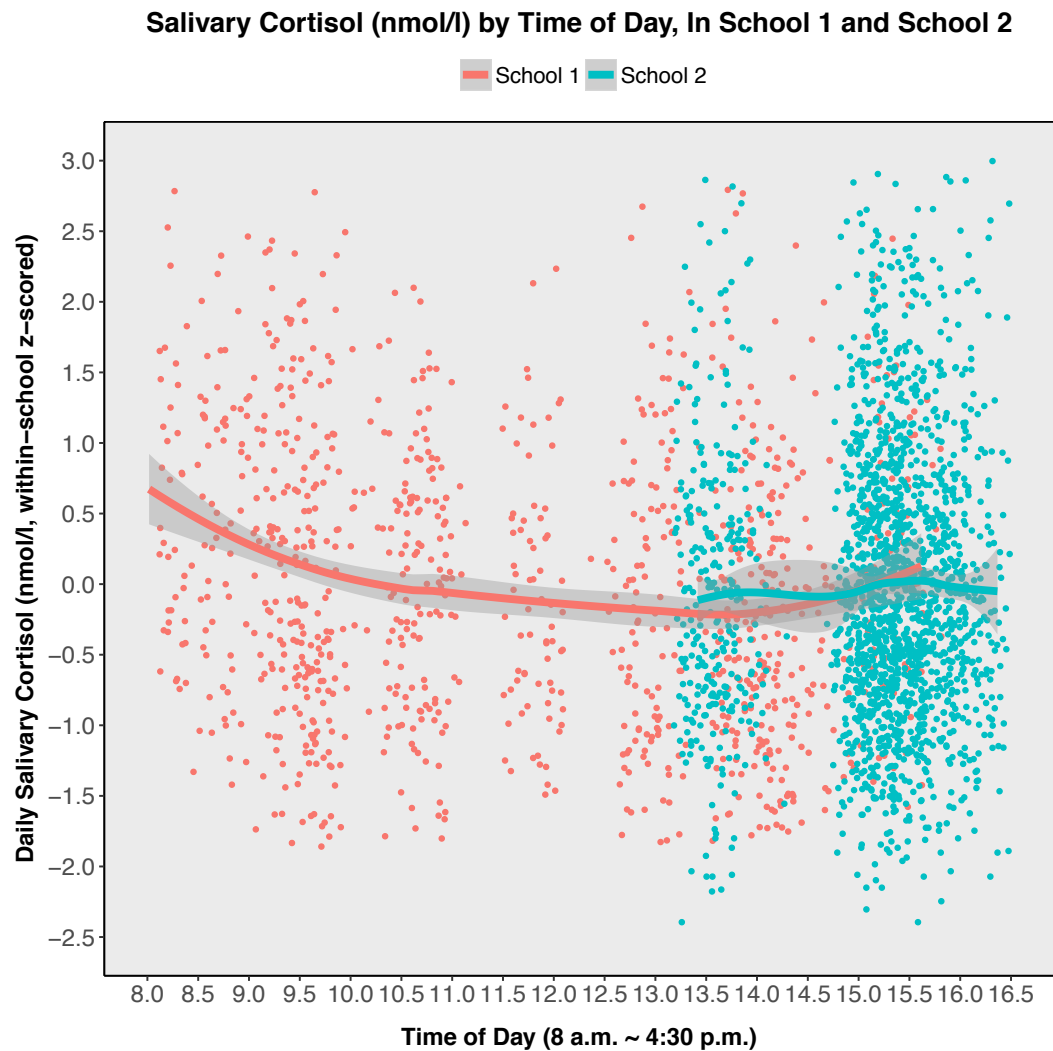
Cortisol Levels by Sampling Day of The Week

This graph shows the random effects of day of the week (Mon ~ Fri) on salivary cortisol concentration (nmol/l; within-school z-scored), by school. A Loess smooth curve was fitted for each school. In all multilevel mixed effects model analyses, day of the week dummies were entered as level-1 covariates (Tue, Wed, Thu, Fri vs. Mon).

Salivary Cortisol (nmol/l) by Day of the Week, In School 1 and School 2
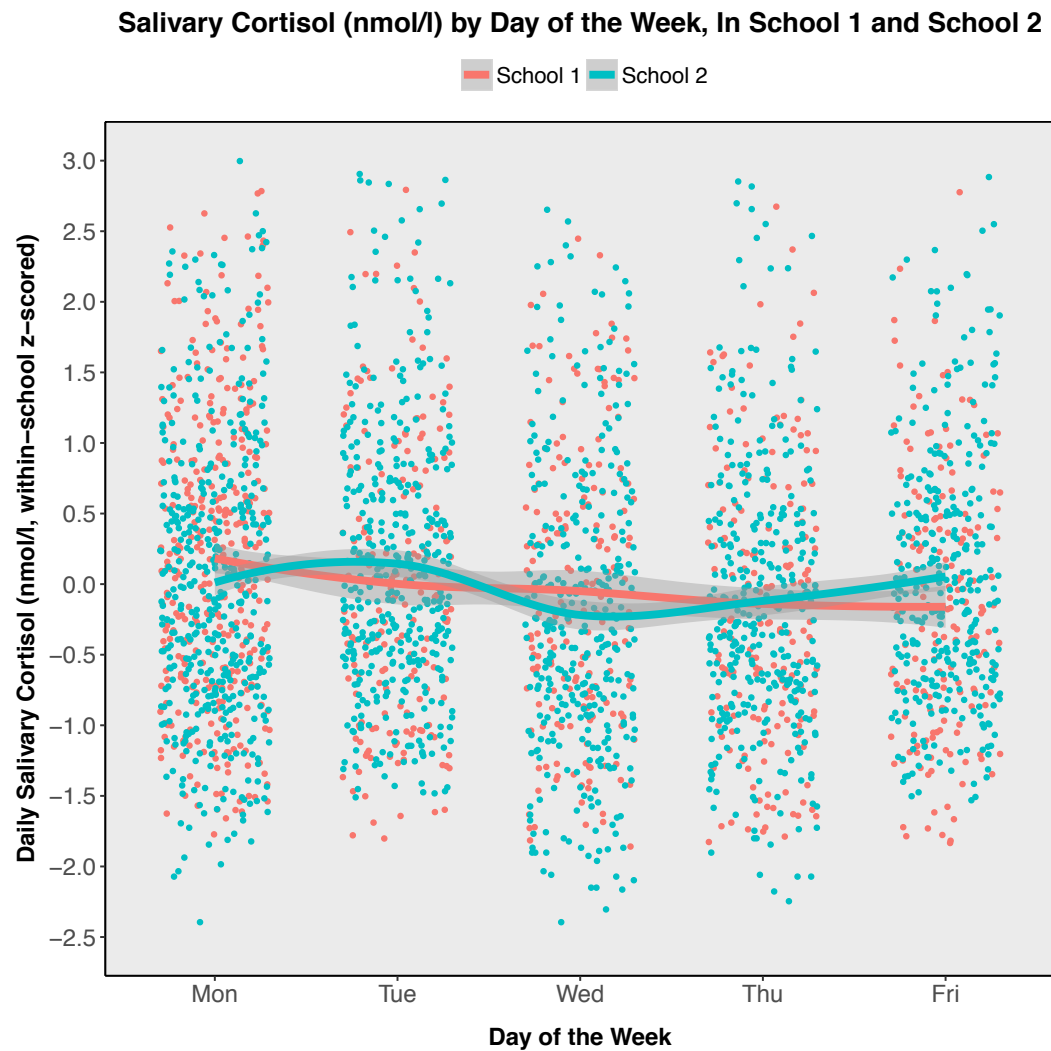
4. Grades Change Transformation

To operationalize a global academic stressor at the beginning of the transition to high school, we computed academic grades change between the first two grading periods (GP1 and GP2; 6-week cycle, respectively). Surveys were administered right after the end of the second grading period and corresponded to students' most recent performance feedback. We obtained official academic records from the school district and computed grades point average (on a 0.0 ~ 4.0 grade point scale) of 9th grade core subjects (English, math, science, social studies) for grading point 1 and 2, respectively. Next, grades change was computed by subtracting GP1 average grades from GP2 average grades in core subjects. Scores greater than zero correspond to grade increases, whereas scores lower than zero indicate grades decline early in the transition to high school. See the density plots below for grading period 1 GPA, grading period 2 GPA, and grades change between GP1 and GP2. Solid red lines represent the sample mean, and dash red lines indicate 1SD above and below from the sample mean. In the primary model analyses, we centered the grades change variable at grand mean, and then estimated simple effects at +1SD (= 0.19 points increase between the 1st and the 2nd marking period) or -1SD (= 0.57 points decline between the 1st and the 2nd marking period) from the grand mean.

Overall Sample
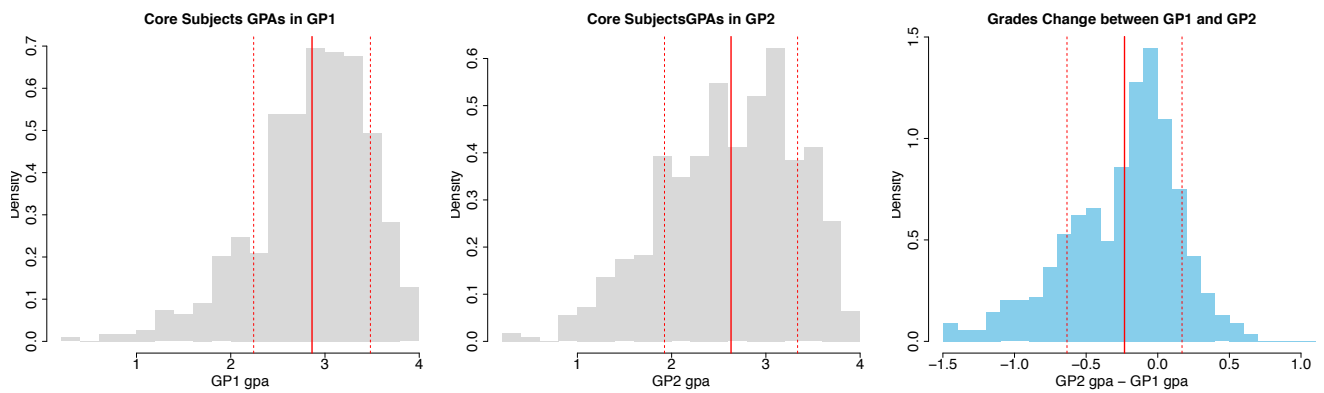
School 1
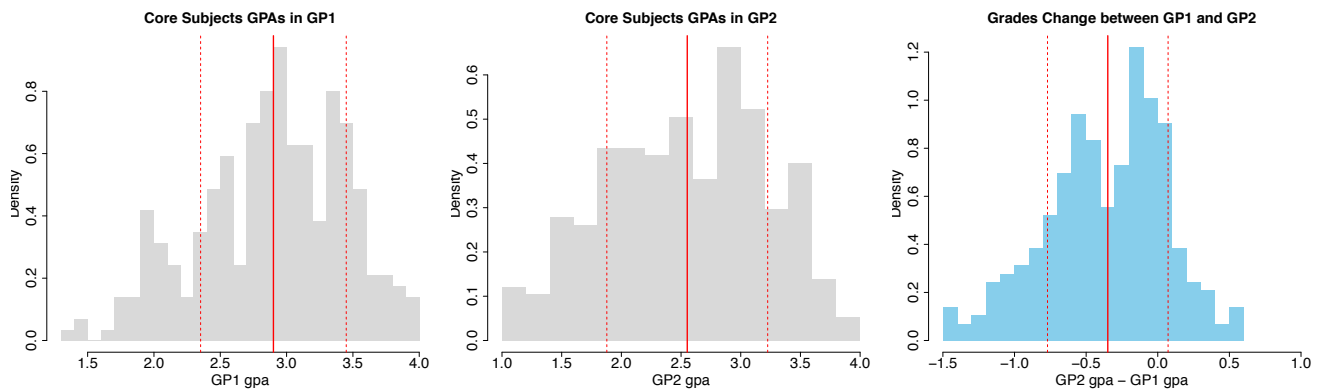
School 2

5. Daily Negative Event Coding

On the daily diary survey, participants were asked to briefly list up to three negative daily events using the prompt below.

In School 1:

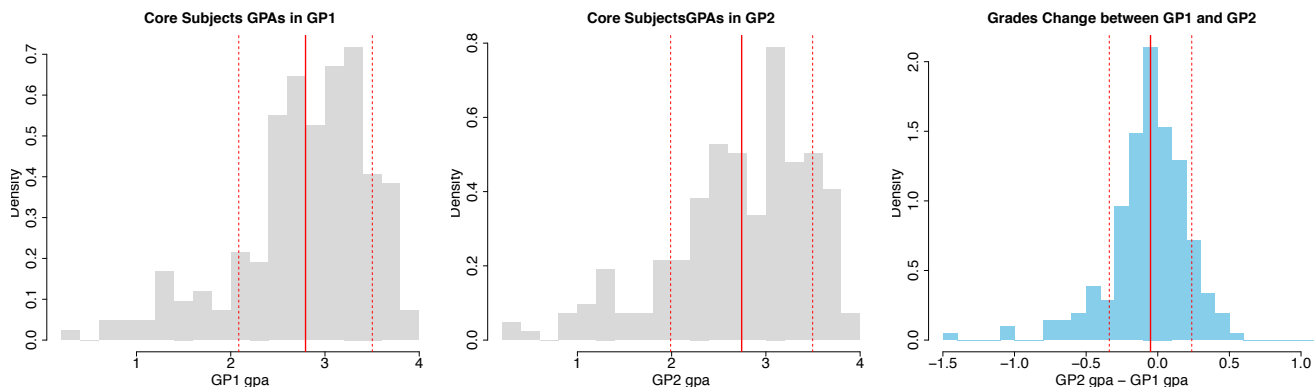> *We want to understand your daily life in school. Think about anything that made you feel NEGATIVE in school TODAY. Then write them in the boxes below. Don't write too much detail. Just write enough so we can understand what happened and why it made you feel negative. Don't worry about writing complete sentences. Just focus on your thoughts and feelings about the event. You can list 0, 1, 2, or 3 events – as many as you like.*

In School 2:

> *In the box below, please write about one NEGATIVE thing that happened today or that you thought a lot about today. Just write enough so we can understand what it was (5-10 words). Now please write about a second NEGATIVE thing that happened today or that you thought a lot about today. Just write enough so we can understand what it was (5-10 words).*

To prepare the dataset for coding, we de-identified participants' IDs. We paired two research assistants and then assigned them to code daily negative event responses based on a written codebook. Below are general instructions given to coders:

> *"During the saliva sampling survey, we asked questions about the student's experience of NEGATIVE events that occurred in the past 24 hours. In the response column, you will see the open-ended responses briefly describing negative events. We will need 2 independent coders to read them carefully and code whether the response belongs to any of the categories listed in the codebook. If so, code "1" for each of the category columns. Also, if you find any life domain categories important but missing, leave a comment. When you are coding, please do not work in the same room with your paired coder. Also, do not discuss your answers with your paired coder or any other 3rd person unless you have technical questions. Please keep in mind that we'd like to record your own judgment on these responses."*

Categories of negative daily events

(1) Academic events
- Receiving a bad grade on exams or homework
- Failing to pass tests
- Too much homework
- Failing to complete school work before due
- Falling behind or not understanding lessons taught in class
- Academic-related negative events (other, not specified above)

(2) Social events

a. *Family events*
- Parents' conflict, separation, divorce, violence
- Fight with parents
- Death or serious illness of family members
- Bad news to family members (e.g., job loss, unemployment, gone to court, incarceration)
- Family-related negative events (other, not specified above)

b. *Peer events*
- Losing friends
- Excluded, bullied, victimized by friends
- Fight with friends or having troubles with friends
- Did not spend time with friends
- Friends-related negative events (other, not specified above)

c. *Boyfriend/girlfriend events*
- Broke up with boy/girlfriend
- Fight with boy/girlfriend or having a trouble with boy/girlfriend
- Betrayed by boy/girlfriend
- Boy/girlfriend (not specified)-related negative events (other, not specified above)

d. *Social media events*
- Didn't receive many likes on Social Media (e.g., Instagram, Facebook, Twitter, etc.)
- Someone shared any negative contents on social media
- Someone left any negative comments/feedback on social media
- Any other negative events happened on social media

e. *Religious events*
- Didn't attend religious worships and events
- Not affiliated with religious groups/communities
- Didn't pray, or didn't do something religious
- Mentioned something negative related to "Jesus", "God", or any other religious leader/figure/gods

f. *Hobbies/activities events*
- Missed opportunities to do fun activities (e.g., end of football season)
- Had to engage in unwanted events or activities (e.g., have to watch boring movies)
- Had no time to enjoy hobbies (e.g., work out/ playing game/ watching TV or movies/ playing bands)

- Poor performance in sports game or art performance, when there's no evidence that this is a school-related extracurricular that receives course credit (e.g., my team didn't win the game last night)
- Job/ work-related (e.g., I had to go to work, late for my shift at work)

g. *Purchase/possession events*

- Personal items stolen, broken, lost
- Money lost
- Missed a chance for shopping, sales & deals
- Regret for recent purchase & shopping

h. *Social other events*

- Conflict with teachers
- Annoyed or having a bad feeling because of some people
- Having trouble with people (not specified as friend or family)
- Didn't get to see someone (not specified as friend or family)
- Pets-related negative events

Across all batches of coding, the inter-coder agreement rate was extremely high. In School 1 data, the average agreement between two coders was 98.2% (min 93.1% ~ max 100%). In School 2 data, the average inter-coder agreement was 97.8% (min 97.1% ~ max 99.6%). For the disputed responses, two coders met in person and resolved the final coding answers by discussing the reasons why they thought it belonged to certain categories and not others.

When participants did not list a negative event or listed a trivial, non-academic/non-social one (e.g., daily mundane hassles), they were given the lowest value on the scale (=1), indicating no or very low intensity of daily negative events, to avoid dropping participants from analyses (testifying to the validity of this, participants who did not list daily negative events rated their day in general as not stressful and exhibited lower cortisol values).

Supplementary Analyses

Table S1. Demographic Characteristics.

	Overall Sample	School 1	School 2
Demographic Information			
Mean Age (SD)	14.2 (0.46)	14.2 (0.50)	14.1 (0.34)
Biological Sex			
Male	47.9%	49.5%	45.1%
Female	52.1%	50.5%	54.9%
Race/Ethnicity			
White/European-American	54.5%	52.4%	58.3%
Hispanic/Latino/a	33.7%	39.2%	24.0%
Black/African-American	3.9%	3.5%	4.6%
Asian/Asian-American	2.9%	1.0%	6.3%
Hawaiian/Pacific Islanders	0.4%	0.3%	0.6%
Native American Indians	0.6%	1.0%	0.0%
Multi-racial/Other ethnicity	3.5%	2.6%	5.1%
Unknown	0.4%	0.0%	1.1%
Family Socioeconomic Status (SES)			
%Free/Reduced-price lunch eligibility	13.6%	16.1%	9.1%
Self-Reported Parental Education			
%Both parents with college degree or above	31.3%	33.8%	26.9%
%Either parent with college degree or above	28.0%	35.7%	14.3%
%Neither parents with college degree	23.0%	28.3%	13.7%
Don't know/Unknown	17.7%	2.3%	45.1%
Academic Performance			
Average 9th grade GPA in 1st grading period (SD)	2.87 (0.60)	2.89 (0.56)	2.84 (0.67)
Student Self-Reports			
Implicit theories of intelligence	2.57 (1.00)	2.61 (0.91)	2.49 (1.13)
Global stress (PSS)	2.96 (0.71)	3.05 (0.66)	2.78 (0.78)
Depressive symptoms (CDI-SF/CDI)	0.32 (0.33)	0.40 (0.37)	0.16 (0.14)

Note: In the manuscript, self-reported parental education was reported by calculating the proportion among students who responded to the question in a comprehensive survey. Student self-reports variables were aggregated by calculating the means scores.

Table S2. Attrition Analysis for Hormone Assessments, in School 1.

	Participants who provided salivary hormone samples (*N*=193)	Participants who didn't consent to salivary hormone assessments (*N*=134)	χ^2 or *t*-test (Hormone Yes vs. No)	
			t(*df*) or χ^2(*df*)	*p-value*
Official School Records				
Gender (%Female)	53.37%	45.52%	χ^2(1)= 1.65	.20
Race (%White)	54.17%	51.49%	χ^2(1)= .13	.72
%Free/Reduced-price lunch eligibility	16.15%	17.91%	χ^2(1)= .07	.79
8th grade test scores	36.07	34.73	*t*(308)= 1.80	.07+
9th grade GPA in the 1st grading period	2.95	2.80	*t*(310)= 2.30	.02*
Absences	2.33	3.14	*t*(316)= -2.74	.006**
%Discipline records	0.09	0.05	*t*(325)= .78	.44
Student Self-Reports				
Entity theory of intelligence	4.39	4.37	*t*(324)= .16	.87
Self-reports of bullying others	1.55	1.55	*t*(320)= -.02	.99
Self-reports of peer victimization	1.99	1.91	*t*(320)= .97	.34
Self-reports of popularity	4.51	4.58	*t*(324)= -.50	.61
Optimism	4.24	4.28	*t*(324)= -.30	.76
Happiness	5.08	4.93	*t*(324)= -1.07	.29
General health	3.81	3.83	*t*(321)= -.15	.88
Global stress (PSS)	31.12	29.94	*t*(322)= 1.58	.12
Depressive symptoms (CDI-S)	4.49	3.75	*t*(322)= 1.72	.09+
%Clinically significant depression	35.60%	24.81%	χ^2(1)= 3.77	.05+
Daily stress	4.30	4.37	*t*(325)= -.33	.74
Daily threat appraisals	3.62	3.83	*t*(325)= -.98	.33
Daily feeling dumb	1.87	2.00	*t*(325)= -1.34	.18
Daily feeling smart	3.14	3.11	*t*(323)= .35	.73
Daily feeling happy	3.62	3.59	*t*(323)= .28	.78
Daily feeling sad	1.81	1.72	*t*(323)= 1.03	.30
Daily feeling excluded	1.53	1.45	*t*(323)= 1.06	.29

Table S3. Daily Hormone Sampling Participation Rate.

	School 1 (max *N*=202)		School 2 (max *N*=172)	
	N	%	*N*	%
Day 1 (Mon/Tue)	162	86.2	159	92.4
Day 2 (Mon)	161	85.6	147	85.5
Day 3 (Tue)	164	87.2	158	91.9
Day 4 (Wed)	166	88.3	160	93.0
Day 5 (Thu)	162	86.2	157	91.3
Day 6 (Fri)	152	80.9	152	88.4
Day 7 (Mon)	-	-	158	91.9
Day 8 (Tue)	-	-	140	81.4
Day 9 (Wed)	-	-	145	84.3
Day 10 (Thu)	-	-	138	80.2
Day 11 (Fri)	-	-	132	76.7

Note: Maximum sample size was determined by including students who (1) returned an active written parental consent and student assent; and (2) provided saliva samples. Missing observations occasionally occurred due to excused/unexcused absences, schedule conflicts (e.g., school events or classes), or voluntary withdrawal.

Table S4. The expanded regression table for primary between-person effects (in Part 1) on daily cortisol levels reported in Table 3, Model I, with coefficients for covariates that were suppressed in the main text for efficiency reasons.

| | Model I | | | |
| | DV: Daily Salivary Cortisol (nmol/l) | | | |
IVs:	b	SE	β	p
(Intercept)	11.65	1.74		<.001***
Level 1 (Day) covariates				
Time of Day (8 a.m.~10 a.m.)	-1.26	0.61	-0.06	.039*
Time of Day (10 a.m.~2 p.m.)	0.01	0.20	0.00	.954
Time of Day (2 p.m.~4 p.m.)	-1.23	0.33	-0.13	<.001***
Day of the Week (Tue)	-1.86	0.33	-0.1	<.001***
Day of the Week (Wed)	-1.37	0.34	-0.07	<.001***
Day of the Week (Thu)	-0.75	0.35	-0.04	.031*
Day of the Week (Fri)	-0.49	0.35	-0.02	.161
Level 2 (Person) predictors				
Entity Theory of Intelligence (centered at +1SD)	0.80	0.35	0.11	**.024***
Grades Change (centered at -1SD)	-0.90	0.35	-0.12	**.010***
Entity Theory of Intelligence × Grades Change	-0.66	0.25	-0.16	**.007****
Level 2 (Person) covariates				
Female (vs. Male)	1.91	0.46	0.13	<.001***
School 2 (vs. School 1)	-5.52	1.69	-0.36	.001**
Intervention Treatment (vs. Control)	-1.6	0.65	-0.11	.014*
Intervention No condition (vs. Control)	-4.74	1.80	-0.16	.009**
8th Grade Test Scores (z-scored)	0.07	0.33	0.01	.826
Depressive Symptoms (z-scored)	0.91	0.34	0.12	.008**
Family SES (z-scored)	1.73	0.60	0.21	.004**
Level 1 N	2,555			
Level 2 N	360			
Residual variance	31.75			
Residual standard deviation	5.64			

<u>Note</u>: The salivary cortisol values reflect greater biological stress indicating HPA-axis activation. Entity theory of intelligence was centered at +1SD from the grand mean. The grades change was calculated by subtracting core subjects GPAs in grading period 1 from those in grading period 2, and then centered at -1SD from the grand mean (at 0.57 point decline in GP 2 relative to GP 1) to estimate simple effects of implicit theories when students experience a grades decline. In level 1 (day level) covariates, time of day dummies were added to account for diurnal rhythms; day of the week dummies were compared against Monday. In level 2 (person level) covariates, school 2 was compared against school 1; female (=1) was compared against male (=0). In addition, 8th grade test scores, baseline depressive symptoms, family socioeconomic status, and intervention conditions were entered as level 2 (person level) covariates. Degrees of freedom varied due to different patterns of missing data for the various measures. b = unstandardized coefficient. + < .10; * < .05; ** < .01; *** < .001.

Table S5. The primary between-person random intercept model predicting daily cortisol levels tested separately for each of the two schools (in Part 1).

IVs:				Model I *DV*: Daily Salivary Cortisol (nmol/l)				
	School 1				School 2			
	b	*SE*	*β*	*p*	*b*	*SE*	*β*	*p*
(Intercept)	6.67	2.07		<.001***	7.72	0.96		<.001***
Level 1 (Day) covariates								
Time of Day (8 a.m.~10 a.m.)	-0.89	0.51	-0.07	.084+				
Time of Day (10 a.m.~2 p.m.)	-0.31	0.19	-0.08	.105				
Time of Day (2 p.m.~4 p.m.)	1.76	0.58	0.11	.002**	-5.28	0.74	-0.26	<.001***
Day of the Week (Tue)	-1.49	0.41	-0.09	<.001***	-2.13	0.46	-0.12	<.001***
Day of the Week (Wed)	-1.47	0.41	-0.09	<.001***	-2.02	0.50	-0.11	<.001***
Day of the Week (Thu)	-2.08	0.41	-0.12	<.001***	-0.45	0.51	-0.02	.379
Day of the Week (Fri)	-2.07	0.42	-0.12	<.001***	-0.29	0.51	-0.02	.567
Level 2 (Person) predictors								
Entity Theory of Intelligence (centered at +1SD)	0.95	0.49	0.15	**.054+**	0.78	0.45	0.11	**.081+**
Grades Change (centered at -1SD)	-1.24	0.53	-0.19	**.020***	-0.71	0.39	-0.10	**.068+**
Entity Theory of Intelligence × Grades Change	-0.81	0.34	-0.24	**.017***	-0.70	0.33	-0.15	**.037***
Level 2 (Person) covariates								
Female (vs. Male)	2.5	0.71	0.2	<.001***	1.65	0.56	0.11	.004**
Intervention Treatment (vs. Control)	-1.55	0.68	-0.12	.023*	0.19	0.58	0.01	.744
Intervention No condition (vs. Control)	-4.39	1.86	-0.14	.019*	-0.09	1.04	0.00	.929
8th Grade Test Scores (z-scored)	0.14	0.35	0.02	.698	-0.55	0.31	-0.07	.081+
Depressive Symptoms (z-scored)	0.92	0.36	0.14	.011*	0.29	0.31	0.04	.353
Family SES (z-scored)	1.88	0.62	0.19	.003**	-1.4	1.21	-0.19	.249
Level 1 *N*	973				1,583			
Level 2 *N*	188				172			
Residual variance	17.31				37.46			
Residual standard deviation	4.16				6.12			

Note: Variable centering methods are same as Table S4. Degrees of freedom varied due to different patterns of missing data for the various measures. *b* = unstandardized coefficient. + < .10; * < .05; ** < .01; *** < .001.

Table S6. A random intercept model showing that the primary between-person interaction predicting daily cortisol levels does not significantly differ across the two schools (in Part 1).

IVs:	Model I DV: Daily Salivary Cortisol (nmol/l)			
	b	SE	β	p
(Intercept)	11.61	1.77		<.001***
Level 1 (Day) covariates				
Time of Day (8 a.m.~10 a.m.)	-1.23	0.62	-0.06	.045*
Time of Day (10 a.m.~2 p.m.)	0.00	0.20	0.00	.986
Time of Day (2 p.m.~4 p.m.)	-1.23	0.33	-0.13	<.001***
Day of the Week (Tue)	-1.86	0.33	-0.10	<.001***
Day of the Week (Wed)	-1.37	0.34	-0.07	<.001***
Day of the Week (Thu)	-0.75	0.35	-0.04	.031*
Day of the Week (Fri)	-0.49	0.35	-0.02	.163
Level 2 (Person) predictors				
Entity Theory of Intelligence (centered at +1SD)	0.67	0.42	0.09	.114
Grades Change (centered at -1SD)	-1.09	0.47	-0.14	.021*
Entity Theory of Intelligence × Grades Change	-0.76	0.33	-0.18	.021*
School × Entity Theory of Intelligence	0.35	0.80	0.05	**.663, *ns***
School × Grades Change	0.28	0.73	0.03	**.701, *ns***
School × Entity Theory of Intelligence × Grades Change	0.03	0.56	0.01	**.951, *ns***
Level 2 (Person) covariates				
Female (vs. Male)	1.93	0.46	0.13	<.001***
School 2 (vs. School 1)	-5.37	1.90	-0.35	.005**
Intervention Treatment (vs. Control)	-1.57	0.65	-0.11	.017*
Intervention No condition (vs. Control)	-4.48	1.82	-0.15	.014*
8th Grade Test Scores (z-scored)	0.06	0.34	0.01	.862
Depressive Symptoms (z-scored)	0.93	0.34	0.12	.006**
Family SES (z-scored)	1.74	0.60	0.21	.004**
Level 1 N	2,555			
Level 2 N	360			
Residual variance	31.76			
Residual standard deviation	5.64			

Note: Variable centering methods are same as Table S4 - S5. Degrees of freedom varied due to different patterns of missing data for the various measures. b = unstandardized coefficient. + < .10; * < .05; ** < .01; *** < .001.

Table S7. Random intercept models showing that absolute GPAs in 9th grade do not moderate the association of implicit theories of intelligence with daily cortisol levels, unlike changes in grades in 9th grade tested in the models above (in Part 1).

	Model I							
	DV: Daily Salivary Cortisol (nmol/l)							
	Average GPAs in the 1st marking period				Average GPAs in the 2nd marking period			
IVs:	b	SE	β	p	b	SE	β	p
(Intercept)	11.6	2.39		<.001***	13.19	2.21		<.001***
Level 1 (Day) covariates								
Time of Day (8 a.m.~10 a.m.)	-1.36	0.61	-0.06	.026*	-1.3	0.61	-0.06	.034*
Time of Day (10 a.m.~2 p.m.)	0.04	0.2	0.01	.860	0.03	0.2	0.01	.895
Time of Day (2 p.m.~4 p.m.)	-1.2	0.33	-0.13	<.001***	-1.21	0.33	-0.13	<.001***
Day of the Week (Tue)	-1.87	0.33	-0.1	<.001***	-1.86	0.33	-0.1	<.001***
Day of the Week (Wed)	-1.37	0.34	-0.07	<.001***	-1.37	0.34	-0.07	<.001***
Day of the Week (Thu)	-0.76	0.35	-0.04	.029*	-0.76	0.35	-0.04	.030*
Day of the Week (Fri)	-0.49	0.35	-0.02	.158	-0.5	0.35	-0.03	.157
Level 2 (Person) predictors								
Entity Theory of Intelligence (centered at +1SD)	0.08	1.05	0.01	**.943, *ns***	1.18	0.88	0.16	**.179, *ns***
Absolute GPAs (centered at -1SD)	-0.37	0.6	-0.03	**.538, *ns***	-0.99	0.53	-0.09	**.065+**
Entity Theory of Intelligence × Absolute GPAs	0	0.36	0	**.990, *ns***	-0.43	0.32	-0.18	**.179, *ns***
Level 2 (Person) covariates								
Female (vs. Male)	1.85	0.47	0.13	<.001***	1.93	0.47	0.13	<.001***
Intervention Treatment (vs. Control)	-5.96	1.68	-0.39	<.001***	-5.7	1.69	-0.38	<.001***
Intervention No condition (vs. Control)	-1.48	0.66	-0.1	0.024*	-1.5	0.65	-0.1	.022*
8th Grade Test Scores (z-scored)	-5.22	1.8	-0.18	.004**	-5.07	1.8	-0.17	.005**
Depressive Symptoms (z-scored)	0.86	0.35	0.11	.014*	0.8	0.34	0.1	.021*
Family SES (z-scored)	1.61	0.6	0.19	.008**	1.63	0.6	0.19	.007**
Level 1 N	2,555				2,555			
Level 2 N	360				360			
Residual variance	31.77				31.77			
Residual standard deviation	5.64				5.64			

Note: As sensitivity analyses, this table shows that between person effects of absolute academic performance levels (average GPAs in the 1st and 2nd marking periods) on daily cortisol levels were not moderated by implicit theories of intelligence. The 1st marking period was at the end of the first six-week cycle in ninth grade, and the 2nd marking period occurred at the end of the second six-week cycle in ninth grade. Variable centering methods are same as Table S4 – S6. Degrees of freedom varied due to different patterns of missing data for the various measures. *b* = unstandardized coefficient. + < .10; * < .05; ** < .01; *** < .001.

Table S8. An exploratory random intercept model showing that implicit theories of intelligence interact with grades change marginally significantly more strongly to predict daily cortisol levels when students report higher average intensity of academic stressors, but not higher average intensity of social stressors (in Part 1).

IVs:	Model I DV: Daily Cortisol (nmol/l)			
	b	SE	β	p
(Intercept)	12.13	1.78		<.001***
Level 1 (Day) covariates				
Time of Day (8 a.m.~10 a.m.)	-1.14	0.62	-0.05	.066+
Time of Day (10 a.m.~2 p.m.)	-0.03	0.2	-0.01	.879
Time of Day (2 p.m.~4 p.m.)	-1.18	0.33	-0.13	<.001***
Day of the Week (Tue)	-1.84	0.33	-0.1	<.001***
Day of the Week (Wed)	-1.34	0.34	-0.07	<.001***
Day of the Week (Thu)	-0.73	0.35	-0.04	.035*
Day of the Week (Fri)	-0.48	0.35	-0.02	.170
Level 2 (Person) predictors				
Entity Theory of Intelligence (centered at +1SD)	1.59	0.55	0.22	**.004****
Grades Change (centered at -1SD)	-1.18	0.45	-0.15	**.009****
Average Intensity of *Academic* Stressors (centered at +1SD)	0.83	0.46	0.11	**.072+**
Average Intensity of *Social* Stressors (centered at +1SD)	-0.01	0.55	0.00	.979, *ns*
Entity Theory of Intelligence × Grades Change	-1.15	0.36	-0.27	**.002****
Average Intensity of *Academic* Stressors × Entity Theory	0.82	0.36	0.19	**.024***
Average Intensity of *Academic* Stressors × Grades Change	-0.4	0.33	-0.09	**.228**
Average Intensity of *Academic* Stressors × Entity Theory × Grades Change	-0.46	0.25	-0.16	**.064+**
Average Intensity of *Social* Stressors × Entity Theory	-0.25	0.42	-0.05	.545, *ns*
Average Intensity of *Social* Stressors × Grades Change	0.23	0.39	0.04	.556, *ns*
Average Intensity of *Social* Stressors × Entity Theory × Grades Change	0.30	0.31	0.07	.326, *ns*
Level 2 (Person) covariates				
Female (vs. Male)	1.74	0.47	0.12	<.001**
School 2 (vs. School 1)	-3.99	0.98	-0.26	<.001**
Intervention Treatment (vs. Control)	-1.26	0.93	-0.04	.180
Intervention No condition (vs. Control)	-0.75	0.47	-0.05	.114
8th-grade Test Scores (z-scored)	-0.22	0.24	-0.03	.375
Depressive Symptoms (z-scored)	0.54	0.26	0.07	.037*
Family SES (z-scored)	1.03	0.55	0.12	.063+
Level 1 N	2,552			
Level 2 N	358			
Residual variance	31.71			
Residual standard deviation	5.63			

Note: This table shows an exploratory random intercept model (shown in Figure 2 in the main text) testing the between-person effects of Entity Theory of Intelligence × Grades Change × Average Intensity of Daily Academic Stressors 3-way interaction on average salivary cortisol levels aggregated over 11 days. Variable centering methods are same as Table S4 – S7. Degrees of freedom varied due to different patterns of missing data for the various measures. b = unstandardized coefficient. + < .10; * < .05; ** < .01; *** < .001.

Table S9. The expanded regression table for between-person effects (in Part 1) on self-reports, with coefficients for covariates that were suppressed in the main text for efficiency reasons.

IVs:	Model II DV: Daily Negative Stress				Model III DV: Daily Threat Appraisals				Model IV DV: Daily Negative Intelligence Attributions			
	b	SE	β	p	b	SE	β	p	b	SE	β	p
(Intercept)	4.17	0.50		<.001***	3.59	0.44		<.001***	2.25	0.21		<.001***
Level 1 (Day) covariates												
Time of Day (8 a.m.~10 a.m.)	-0.13	0.16	-0.02	.398	-0.19	0.14	-0.03	.167	0.03	0.06	0.01	.644
Time of Day (10 a.m.~2 p.m.)	0.07	0.05	0.04	.231	0.05	0.05	0.04	.283	0.00	0.02	0.00	.964
Time of Day (2 p.m.~4 p.m.)	-0.13	0.11	-0.04	.207	-0.16	0.09	-0.06	.079+	-0.02	0.05	-0.01	.710
Day of the Week (Tue)	-0.05	0.10	-0.01	.623	-0.02	0.09	0.00	.818	-0.03	0.04	-0.01	.399
Day of the Week (Wed)	-0.05	0.10	-0.01	.626	-0.27	0.09	-0.05	.002**	-0.13	0.04	-0.05	.002**
Day of the Week (Thu)	-0.13	0.10	-0.02	.184	-0.23	0.09	-0.04	.010*	-0.15	0.04	-0.06	<.001***
Day of the Week (Fri)	-0.56	0.10	-0.08	<.001***	-0.46	0.09	-0.08	<.001***	-0.15	0.04	-0.05	<.001***
Level 2 (Person) predictors												
Entity Theory of Intelligence	0.30	0.11	0.12	**.008**	0.25	0.1	0.11	**.010***	0.16	0.05	0.15	**.002**
Grades Change	-0.26	0.11	-0.10	**.021***	-0.27	0.1	-0.12	**.005**	-0.10	0.05	-0.10	**.033***
Entity Theory of Intelligence × Grades Change	-0.16	0.08	-0.11	**.045***	-0.15	0.07	-0.11	**.037***	-0.03	0.04	-0.05	**.432, ns**
Level 2 (Person) covariates												
Female (vs. Male)	0.27	0.15	0.05	.077+	0.27	0.13	0.06	.040*	-0.01	0.07	-0.01	.861
School 2 (vs. School 1)	0.93	0.39	0.18	.017*	0.18	0.33	0.04	.583	-0.31	0.17	-0.15	.064+
Intervention Treatment (vs. Control)	0.09	0.20	0.02	.662	-0.06	0.17	-0.01	.040*	0.06	0.09	0.03	.467
Intervention No condition (vs. Control)	0.25	0.36	0.03	.489	0.13	0.31	0.02	.704	-0.11	0.16	-0.03	.485
8th-grade Test Scores (z-scored)	0.02	0.08	0.01	.754	-0.22	0.07	-0.10	.001**	-0.06	0.03	-0.06	.058+
Depressive Symptoms (z-scored)	0.70	0.08	0.26	<.001***	0.79	0.07	0.34	<.001***	0.29	0.04	0.27	<.001***
Family SES (z-scored)	0.10	0.16	0.03	.523	-0.12	0.14	-0.05	.383	-0.01	0.07	-0.01	.852
Level 1 *N*	3,371				3,372				3,152			
Level 2 *N*	486				486				481			
Residual variance	3.56				2.74				0.54			
Residual standard deviation	1.89				1.66				0.74			

Note: Variable centering methods are same as Table S4 – S8. Degrees of freedom varied due to different patterns of missing data for the various measures. *b* = unstandardized coefficient. + < .10; * < .05; ** < .01; *** < .001.

Table S10. Random intercept models showing that the between-person interactions predicting self-reports do not significantly differ across the two schools (in Part 1).

IVs:	Model II *DV*: Daily Negative Stress				Model III *DV*: Daily Threat Appraisals				Model IV *DV*: Daily Negative Intelligence Attributions			
	b	*SE*	*β*	*p*	*b*	*SE*	*β*	*p*	*b*	*SE*	*β*	*p*
(Intercept)	4.09	0.51		<.001***	3.68	0.44		<.001***	2.25	0.21		<.001***
Level 1 (Day) covariates												
Time of Day (8 a.m.~10 a.m.)	-0.11	0.16	-0.02	.467	-0.19	0.14	-0.03	.172	0.03	0.06	0.01	.651
Time of Day (10 a.m.~2 p.m.)	0.05	0.05	0.03	.326	0.05	0.05	0.04	.303	0.00	0.02	0.00	.959
Time of Day (2 p.m.~4 p.m.)	-0.1	0.11	-0.03	.334	-0.16	0.09	-0.05	.088	-0.02	0.05	-0.01	.736
Day of the Week (Tue)	-0.05	0.10	-0.01	.625	-0.02	0.09	0	.815	-0.03	0.04	-0.01	.397
Day of the Week (Wed)	-0.05	0.10	-0.01	.611	-0.27	0.09	-0.05	.002**	-0.13	0.04	-0.05	.001***
Day of the Week (Thu)	-0.14	0.10	-0.02	.174	-0.23	0.09	-0.04	.010*	-0.15	0.04	-0.06	<.001***
Day of the Week (Fri)	-0.56	0.10	-0.08	<.001***	-0.46	0.09	-0.08	<.001***	-0.15	0.04	-0.05	<.001***
Level 2 (Person) predictors												
Entity Theory of Intelligence	0.32	0.13	0.12	.013*	0.33	0.11	0.15	.002**	0.17	0.06	0.16	.003**
Grades Change	-0.28	0.14	-0.11	.045*	-0.29	0.12	-0.13	.014*	-0.11	0.06	-0.11	.062+
Entity Theory of Intelligence × Grades Change	-0.22	0.10	-0.15	.027*	-0.15	0.09	-0.11	.092+	-0.05	0.04	-0.07	.303, *ns*
School × Entity Theory of Intelligence	-0.29	0.30	-0.11	**.324, *ns***	-0.37	0.25	-0.15	**.146, *ns***	-0.09	0.13	-0.08	**.477, *ns***
School × Grades Change	0.18	0.26	0.06	**.495, *ns***	0.18	0.22	0.07	**.409, *ns***	0.02	0.11	0.01	**.894, *ns***
School × Entity Theory of Intelligence × Grades Change	0.25	0.20	0.15	**.210, *ns***	0.15	0.17	0.1	**.403, *ns***	0.08	0.09	0.11	**.386, *ns***
Level 2 (Person) covariates												
Female (vs. Male)	0.26	0.15	0.05	.091+	0.27	0.13	0.06	.041*	-0.01	0.07	-0.01	.843
School 2 (vs. School 1)	0.53	0.59	0.10	.367	-0.23	0.44	-0.05	.606	-0.33	0.23	-0.16	.147
Intervention Treatment (vs. Control)	0.11	0.20	0.02	.584	-0.07	0.17	-0.02	.672	0.06	0.09	0.03	.467
Intervention No condition (vs. Control)	0.22	0.37	0.02	.545	0.08	0.31	0.01	.794	-0.11	0.16	-0.03	.503
8th-grade Test Scores (z-scored)	-0.06	0.10	-0.02	.514	-0.21	0.07	-0.09	.002**	-0.06	0.03	-0.06	.062+
Depressive Symptoms (z-scored)	0.64	0.10	0.24	<.001***	0.81	0.07	0.35	<.001***	0.29	0.04	0.27	<.001***
Family SES (z-scored)	0.05	0.17	0.02	.766	-0.1	0.14	-0.04	.468	-0.01	0.07	-0.01	.842
Level 1 *N*	3,371				3,372				3,152			
Level 2 *N*	486				486				481			
Residual variance	3.56				2.74				0.54			
Residual standard deviation	1.89				1.66				0.74			

Note: Variable centering methods are same as Table S4 – S9. Degrees of freedom varied due to different patterns of missing data for the various measures. *b* = unstandardized coefficient. + < .10; * < .05; ** < .01; *** < .001.

Table S11. Permutation tests showing that the between-person effects are unlikely to have appeared due to chance (in Part 1).

	%Significant for Entity Theory of Intelligence × Grades Change Interaction	%Significant for Simple Effects of an Entity Theory of Intelligence	%Significant for 2-Way Interaction and Simple Effects of an Entity Theory of Intelligence
DVs:			
Daily Cortisol	4.2%	3.0%	2.1%
Daily Stress	2.3%	2.3%	0.4%
Daily Threat Appraisals	3.5%	4.2%	1.9%
All 3 Dependent Variables	0.0%	0.0%	0.0%

Note: Relying on the logic of a permutation test (Ernst, 2004), we constructed a series of "null" datasets that, by design, should show no association between implicit theories, and stress or threat appraisals. The permutation test shuffles only the column with the implicit theories of intelligence variable into a random order and then tests whether this null dataset shows the focal results here, which were significant ($p < .05$) interactions between grades change and implicit theories of intelligence for all three outcomes of cortisol, self-reported negative stress, and threat appraisals; and significant ($p < .05$) simple effects of implicit theories among those with grade declines (-1SD grades change) in the expected direction. By construction, the significant results in this null dataset are due to chance alone. We repeat this for 1000 iterations and count the % of randomly permuted datasets that show the same pattern as the real data. Results showed that *no* randomly-permuted dataset showed significant interactions and simple effects for all three outcomes, unlike the observed data. This simulation suggests that it is not likely that the overall pattern of between-person effects across outcomes was due to chance alone.

.

Table S12. Supplementary within-person random slope models showing that more fully modeling the random intercept does not produce the cross-level interaction results that differ from what is reported in Table 4 in the main text; note that the level 2 predictors of the random intercept differ from the primary model because within-person analyses use a different subset of data due to listwise deletion (in Part 2).

	DV: Current Day's Cortisol (nmol/l)							
	Model V Academic Stressors Only				Model VI Academic and Social Stressors			
IVs:	*B*	*SE*	*β*	*p*	*B*	*SE*	*β*	*p*
(Intercept)	10.96	1.91		<.001***	10.87	1.91		< .001***
Level 1 (Day)								
Intensity of Previous Day's Academic Stressors (*t*-1)	-1.07	0.34	-0.12	**.002****	-1.06	0.34	-0.12	**.002****
Intensity of Previous Day's Social Stressors (*t*-1)					0.18	0.29	0.02	.536
Time of Day (8 a.m.~10 a.m.)	-1.11	0.69	-0.05	.106	-1.14	0.69	-0.05	.097+
Time of Day (10 a.m.~2 p.m.)	-0.06	0.22	-0.01	.793	-0.05	0.22	-0.01	.817
Time of Day (2 p.m.~4 p.m.)	-1.67	0.36	-0.19	<.001***	-1.68	0.36	-0.19	<.001***
Day of the Week (Tue)	-1.54	0.44	-0.09	<.001***	-1.55	0.44	-0.09	<.001***
Day of the Week (Wed)	-1.15	0.44	-0.07	.009**	-1.11	0.44	-0.06	.012*
Day of the Week (Thu)	-0.61	0.45	-0.03	.172	-0.58	0.45	-0.03	.193
Day of the Week (Fri)	-0.45	0.45	-0.02	.317	-0.38	0.45	-0.02	.395
Level 2 (Person)								
Incremental Theory of Intelligence	0.48	0.39	0.07	.216	0.49	0.39	0.07	.212
Grades Change	0.14	0.40	0.02	.731	0.14	0.40	0.02	.720
Average Intensity of Academic Stressors	-0.21	0.33	-0.03	.526	-0.21	0.33	-0.03	.529
Incremental Theory of Intelligence × Grades Change	-0.44	0.27	-0.10	.112	-0.44	0.27	-0.10	.109
Incremental Theory of Intelligence × Average Intensity of Academic Stressors	0.22	0.24	0.04	.354	0.22	0.24	0.04	.352
Female (vs. Male)	1.79	0.48	0.12	<.001***	1.80	0.48	0.12	<.001***
School 2 (vs. School 1)	-3.14	1.05	-0.21	.003**	-3.13	1.05	-0.21	.003**
Intervention Treatment (vs. Control)	-1.49	0.99	-0.05	.132	-1.50	0.99	-0.05	.129
Intervention No condition (vs. Control)	-0.52	0.49	-0.04	.285	-0.53	0.49	-0.04	.278
8th-grade Test Scores	-0.28	0.25	-0.04	.251	-0.29	0.25	-0.04	.249
Depressive Symptoms	0.71	0.25	0.09	.005**	0.70	0.25	0.09	.006**
Family SES	0.86	0.56	0.10	.126	0.87	0.56	0.10	.125
Cross-Level Interaction								
Intensity of Previous Day's Academic Stressors (*t*-1) × Incremental Theory of Intelligence	0.46	0.16	0.08	**.005****	0.46	0.16	0.08	**.005****
Intensity of Previous Day's Academic Stressors (*t*-1) × Grades Change	0.22	0.18	0.04	.213	0.22	0.18	0.04	.222
Intensity of Previous Day's Social Stressors (*t*-1) × Incremental Theory of Intelligence					0.06	0.15	0.01	.673
Intensity of Previous Day's Social Stressors (*t*-1) × Grades Change					-0.03	0.16	0.00	.864
Level 1 *N*	1,941				1,941			
Level 2 *N*	354				354			
Residual variance	31.38				31.38			
Residual standard deviation	5.60				5.60			

Note: Level 1 (day level) predictors were centered at person-level mean; Incremental theory of intelligence was centered at -1SD from the grand mean; Grades change was centered at -1SD from the grand mean. Degrees of freedom varied due to different patterns of missing data for the various measures. *b* = unstandardized coefficient. + < .10; * < .05; ** < .01; *** < .001

Table S13. Within-person random slope models summarized in the main text which show that there are no significant interactions between implicit theories of intelligence and the intensity of previous day's academic stressors predicting the current day's negative stress and threat appraisals (in Part 2).

IVs:	Model VII DV: Current Day's Negative Stress				Model VII DV: Current Day's Threat Appraisals			
	B	SE	β	p	B	SE	β	p
(Intercept)	4.18	0.72		<.001***	3.91	0.6		< .001***
Level 1 (Day)								
Intensity of Previous Day's Academic Stressors (t-1)	0.07	0.09	0.02	.431	0.04	0.08	0.02	.615
Intensity of Current Day's Academic Stressors (t-1)	0.29	0.05	0.09	<.001***	0.09	0.04	0.03	.041*
Time of Day (8 a.m.~10 a.m.)	0.05	0.25	0.01	.835	0.06	0.21	0.01	.758
Time of Day (10 a.m.~2 p.m.)	-0.01	0.08	-0.01	.899	0.02	0.07	0.01	.773
Time of Day (2 p.m.~4 p.m.)	0.07	0.14	0.02	.613	-0.18	0.11	-0.07	.105
Day of the Week (Tue)	-0.03	0.15	0.00	.842	0.12	0.12	0.02	.332
Day of the Week (Wed)	0.04	0.15	0.01	.762	-0.09	0.12	-0.02	.451
Day of the Week (Thu)	-0.16	0.15	-0.03	.271	-0.05	0.13	-0.01	.666
Day of the Week (Fri)	-0.61	0.15	-0.09	<.001***	-0.28	0.13	-0.05	.026*
Level 2 (Person)								
Incremental Theory of Intelligence	0.27	0.15	0.11	.072+	0.18	0.12	0.09	.151
Grades Change	-0.31	0.15	-0.11	.036*	-0.27	0.12	-0.12	.024*
Incremental Theory of Intelligence × Grades Change	-0.14	0.11	-0.1	.175	-0.12	0.09	-0.10	.157
Female (vs. Male)	0.27	0.2	0.05	.168	0.26	0.16	0.06	.115
School 2 (vs. School 1)	0.70	0.41	0.13	.092+	0.21	0.34	0.05	.542
Intervention Treatment (vs. Control)	0.01	0.2	0.00	.941	-0.03	0.16	-0.01	.856
Intervention No condition (vs. Control)	-0.09	0.41	-0.01	.822	-0.05	0.33	-0.01	.891
8th-grade Test Scores	0.09	0.1	0.03	.385	-0.21	0.08	-0.10	.011*
Depressive Symptoms	0.69	0.1	0.26	<.001***	0.79	0.08	0.35	<.001***
Family SES	0.06	0.23	0.02	.795	-0.28	0.19	-0.11	.142
Cross-Level Interaction								
Intensity of Previous Day's Academic Stressors (t-1) × Incremental Theory of Intelligence	-0.03	0.05	-0.01	**.530, ns**	0.03	0.04	0.02	**.492, ns**
Intensity of Previous Day's Academic Stressors (t-1) × Grades Change	-0.1	0.06	-0.05	.091+	-0.03	0.05	-0.02	.498
Level 1 N	1,934				1,935			
Level 2 N	354				354			
Residual variance	3.38				2.43			
Residual standard deviation	1.84				1.56			

Note: Level 1 (day level) predictors were centered at person-level mean; Incremental theory of intelligence was centered at -1SD from the grand mean; Grades change was centered at -1SD from the grand mean. Degrees of freedom varied due to different patterns of missing data for the various measures. b = unstandardized coefficient. + < .10; * < .05; ** < .01; *** < .001.