

Boys Don't Work? On the Psychological Benefits of Showing Low Effort in High School

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Abstract Male students show less academic effort and lower academic achievement than do female students. The present study aimed to shed more light on the reasons for why male students show low academic effort despite the finding that this undermines their academic achievement. We explored whether students experience psychological benefits from showing low effort or “effortless” achievement in school and whether these benefits are greater for male than for female students. In two experimental vignette studies with independent samples of German ninth graders ($N = 210$) and teachers ($N = 176$), we systematically varied student targets’ gender, effort, and achievement and tested for effects on targets’ ascribed intelligence, popularity, likeability, masculinity, femininity, and gender-typicality. The “effortless” achiever was rated as more popular than students showing high effort. Teachers perceived the effortless achiever as the most intelligent target. Academic effort further increased students’ ratings of a low-achieving target’s likeability and students’ and teachers’ ratings of all targets’ femininity as well as decreased students’ ratings of all targets’ masculinity. Students and teachers perceived targets showing low (vs. high) effort as more similar to a typical boy, whereas teachers perceived targets showing high (vs. low) effort as more similar to a typical girl. Results indicate a need to understand the psychological benefits of low academic engagement, especially for male students, and to address the feminine stereotyping of (academic) effort.

Keywords Human sex differences · Gender roles · Gender stereotypes · Academic achievement · Effort · Popularity · Masculinity

A great deal of research has shown that in many Western industrialized countries, boys lag behind girls on indicators of academic achievement. Boys are known to earn lower grades (for an international meta-analysis, see Voyer and Voyer 2014). The graduation rate is lower for male students than for female students and male students drop out of school more often than do female students (for an overview, see Buchmann et al. 2008). Many studies have additionally revealed that in many countries male students are less engaged in school than are female students (Cooper 2014; Lietaert et al. 2015). For instance, male students are more likely to go to school unprepared in the United States (National Center for Educational Statistics [NCES] 2007) and to report spending less time and effort on homework than do female students in Germany (Trautwein et al. 2006). They also report liking school less (Ireson and Hallam 2005) and have a less positive attitude toward school than do girls (Organisation for Economic Co-operation and Development [OECD] 2013). Such gender differences in academic engagement and effort account for the finding that male students exhibit lower academic achievement than do female students (Downey and Vogt Yuan 2005; Kenney-Benson et al. 2006; Lam et al. 2012). The present research aims to shed more light on the reasons for why male students show less academic effort than do female students despite the finding that low academic effort undermines their academic achievement. In two experimental vignette studies with a German student sample (Study 1) and a German teacher sample (Study 2), we studied whether male targets experience larger psychological benefits of showing low academic effort than do female targets. Precisely, we

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explored the effects of showing low or high effort at school on ascriptions of male and female targets' intelligence, peer status, masculinity, femininity, and gender-typicality.

Academic Effort and Achievement

Many theoretical models of academic learning and achievement include students' effort as a pathway through which students' motivation contributes to students' educational outcomes (Boekaerts 2007; Eccles and Wigfield 2002; Pintrich and de Groot 1990). Academic effort is, among other psychological constructs such as students' aptitude, an important positive predictor of academic success: The harder students work, the higher their achievement. In correlational studies with secondary school student samples, students showing high effort have been found to be more successful than are students with similar intelligence or similar prior achievement who show low effort (Carbonaro 2005 in the U.S.; Downey and Vogt Yuan 2005 in the U.S.; Jussim and Eccles 1992 in the U.S.; Trautwein et al. 2009 in Germany). Also, students' level of effort regulation fosters academic success. Students who keep on working even on difficult or unpleasant tasks or even when they are not good at a task are academically more successful than are students with low effort regulation (Pintrich and de Groot 1990 in the U.S.; Schwinger et al. 2009 in Germany). A meta-analysis on the psychological correlates of university students' academic achievement even showed that in such selective samples, academic effort was more strongly correlated with achievement than other well-established academic predictors such as students' intelligence or conscientiousness (Richardson et al. 2012).

Several mechanisms contribute to the positive relation between effort and achievement. First, effort directly fosters students' mastery of course material as indicated by students' grades (Lysne 1984). Second, teachers reward effort as such with higher grades. Vignette experiments and scenario studies with fictitious student targets have consistently shown that teachers give higher grades to students who show effort than to objectively equally performing students who do not show effort (Brookhart 1993; Randall and Engelhard 2010 in the U.S.; Sun and Cheng 2014 in China). Low-performing students in particular were found to receive higher grades if they were perceived as hard-working (Randall and Engelhard 2010). U.S. American teachers' self-reports have confirmed this grading practice (Cizek et al. 1995; McMillan 2001; McMillan et al. 2002). In correlational field studies, teachers' ratings of students' effort positively predicted students' grades even above and beyond students' self-rated effort (Jussim et al. 1996). Teachers' grading practices indicate that there is a need to go beyond the current practice of focusing exclusively on students' perspectives and ratings when studying the effects of academic effort. The teachers' perspective should also be included in

order to obtain a more complete picture of what students experience when they show high or low effort in school.

Gender Differences in Effort and Achievement

The positive relation between effort and grades plays a pivotal role in explaining gender differences in academic achievement. Many studies, using either students' self-reports or ratings by others (teachers or parents), have revealed that female students show more effort in school than do male students. For instance, Lam et al. (2012) studied a large sample of adolescents (in the seventh to ninth grades) from many countries and found that female students had higher scores on self-report measures of persistence and effort. Female university students reported placing more personal value on working hard than did male students (McCrea et al. 2008 in the U.S.). When differentiating gender-specific academic cultures in a large sample of Belgian adolescents, one study showed that boys' culture was less study-oriented than was girls' (Van Houtte 2004).

Other behavioral indicators of academic effort also differ by gender. For example, male tenth graders in the United States were more likely to go to school unprepared without school books, supplies, or homework, a finding that has held true for decades as data from several large representative samples have shown (NCES 2007). Also in Germany, adolescent boys report spending less time and effort on homework than do girls (Trautwein et al. 2006). In addition, male students showed higher scores on work avoidance in a sample of German adolescents (Steinmayr and Spinath 2008). Similarly, in a sample of Israeli students from Grades 5 and 6, boys more often showed an "avoidant-covert pattern" of help-seeking (Butler 1998), which is essentially the same as cheating because this variable was operationalized by copying answers from others or a textbook and is diametrically opposed to working hard. Also, teachers evaluate male adolescents as being less attentive and more disruptive and as putting forth less effort in school, thus ascribing poorer "in-class-citizenship" to male adolescents than to female adolescents (Downey and Vogt Yuan 2005; using a large U.S. American sample, covering Grades 8 to 12). Duckworth and Seligman (2006) found that not only teachers but also parents perceived female adolescents as more self-disciplined than male adolescents are, and German parents were found to ascribe a greater willingness to learn to their daughters than to their sons (Neugebauer 2011).

These very consistent gender differences on many indicators of academic effort are so relevant because many studies have shown that female students' higher academic effort explains why female students tend to earn higher grades than equally competent male students (Downey and Vogt Yuan 2005; Lam et al. 2012). These results indicate that if male students put the same amount of effort into school as female students do or if

male students were perceived by teachers as putting the same amount of effort into school as female students do, male students would likely earn the same (high) grades.

Academic Effort and Perceptions of the Achiever

In Western cultures, academic effort predicts not only higher achievement, but also the *perception* of the achiever and his or her achievement as such, irrespective of the achiever's gender. First, studies involving student samples have indicated that in the case of academic failure, students showing low academic effort are perceived as more intelligent than hard-working students are because the former's poor performance can be attributed to their apparent lack of effort and not to a self-worth threatening lack of aptitude (for an experimental study see Covington and Omelich 1979a; for a correlational study see Feick and Rhodewalt 1997; for a review see Urdan and Midgley 2001). As such, showing low effort can provide a face-saving excuse for a student with poor academic achievement. Second, the amount of effort also influences the perception of academic success. In this case, an apparent lack of effort indicates that a student's high achievement is solely due to his or her high ability or intelligence. Therefore, achievement that appears "effortless" is perceived as an indicator of "real genius," as, for instance, an experimental study by Covington and Omelich (1979b) with U.S. American university students shows. From a self-presentation perspective, showing low effort offers students a win-win situation: If they are not successful, low effort can function as a self-handicapping strategy and can thus provide an excuse so that the students' aptitude is not called into question (Rhodewalt and Fairfield 1991). If they are successful, their success is especially valued because it appears "effortless" and is, therefore, more valuable. This mechanism was identified not only in experimental studies but also in qualitative interview studies with British boys (Jackson 2002, 2003), indicating that students are well aware of it. It seems plausible that this reasoning also applies to teachers. However, to our knowledge, this possibility has not yet been studied.

It is important to note, however, that the glorification of effortless achievement among students seems to be specific to U.S. American or "Western" samples because studies have shown that effort is highly valued and emphasized as the key to academic success in Asian cultures (Hess and Azuma 1991). Whereas Western education "motivates children ... to prove the self ..., Asian children are repeatedly encouraged to ... improve the self" (Trommsdorff and Rothbaum 2008, p. 100). Research has also shown that the Japanese, compared with North Americans, have a stronger incremental view of intelligence itself, describing intelligence as more malleable and as being more strongly due to effort compared with North Americans (Heine et al. 2001). Such findings from cross-

cultural research imply that the present study's view of effortless achievement is specific to Western cultures such as Germany, where the present study was located.

Taken together, the amount of academic effort influences both academic achievement itself and students' perceptions of a student's potential to achieve. Whereas high academic effort fosters academic achievement, low academic effort can trigger self-serving attributions for both female and male low and high achievers as studies with student samples have shown. A student who achieves "effortlessly" should be perceived as the most intelligent student in Western cultures. However, previous studies have focused on student samples and none is known to have explicitly studied teachers' perceptions.

Academic Effort and Peer Status

Academic effort not only influences perceptions of students' achievement and aptitude, but also is linked in Western cultures to two dimensions of students' peer status: popularity and likeability (the latter is also referred to as liking, acceptance or preference). *Popularity* in adolescence refers to being perceived as popular, powerful, and prestigious, usually measured in sociometric studies by asking students which of their classmates they think is popular or a leader. *Likeability* stands for being well-liked by peers and reflects students' indications that they personally like a classmate or want to be friends with him or her (Cillessen and Marks 2011). A peer nomination study demonstrated that students' and teachers' nominations of popular and well-liked students overlapped considerably (van den Berg et al. 2015). Whereas both constructs are closely linked in childhood, only small-to-moderate correlations have been found in adolescence (Cillessen and Mayeux 2004; van der Linden et al. 2010), indicating the need to distinguish between the two constructs. Empirical studies from different strands of research point toward differential relations between effort and popularity as well as effort and likeability.

Experimental vignette studies with student samples have revealed that effort and effortless achievement influence students' popularity. Differential effects were found for different achievement levels and age groups. In a U.S. American study, only fourth-graders (but not adolescent students) rated lazy students as less popular among their peers than were hard-working students. Adolescents, on the contrary, rated students who were described as able but lazy as the most popular student type, especially if the target was described as successful in school (Juvonen and Murdock 1995). A study of German adolescents focusing on high-achieving student targets supported these findings in general, but the study did not differentiate between popularity and likeability: The so-called "nerds" were rated as having the lowest peer status (a combination of popularity and likeability) if they showed high effort, whereas low effort increased their peer status. The effect was

stronger for male than for female targets (Rentzsch et al. 2011 Study 2). For average-achieving students, however, only a gender-specific effect of effort on students' peer status was revealed. Whereas male students showing high effort were rated as having a lower peer status than were male students showing low effort, the opposite effect was found for female students (Rentzsch et al. 2011 Study 1). Unfortunately, because popularity and likeability ratings were aggregated in the studies by Rentzsch et al. (2011), it was not possible to explore the effects of academic effort on both constructs in greater detail.

In contrast to students' popularity, students' likeability was found to be positively linked to students' academic behaviors and performances (for a summary, see Bruyn and Cillessen 2006). For example in a sociometric study with U.S. American students ranging from 9 to 13 years of age, disliked students were perceived as not trying as hard as average students to do good school work. Well-liked girls (but not well-liked boys) were rated as trying harder in school than average students (Lease et al. 2002). Such findings from peer nomination studies tentatively suggest a *positive* effect of effort on a student's likeability—at least for female students. Thus, in order to obtain a more nuanced picture of the benefits of peer status and downsides of academic effort for boys and girls, experimental studies that differentiate between popularity and likeability are needed to test whether showing low academic effort actually undermines students' likeability but fosters students' popularity.

Academic Effort and Gender Stereotyping

Several studies have pointed toward a stereotyping of high academic effort as feminine and low academic effort as masculine. For instance, inventories for assessing femininity include “diligent” as an attribute that is perceived by adolescents as typical of girls. Being “lazy,” by contrast, was pretested in Germany as typical of boys and is therefore commonly used to measure masculinity in adolescents (Krahé et al. 2007). An implicit social cognition test also revealed that German ninth-graders associated school, and academic engagement in general, more strongly with “female” than with “male” (Heyder and Kessels 2013). Furthermore, teachers' and students' stereotypical perceptions of male students as being troublesome and lazy, and female students as being hard-working and diligent (for a summary, see Heyder and Kessels 2015), also indicate a stereotyping of academic effort as feminine. Further, in a British interview study, male college students characterized academic effort, hard work, and diligence as key characteristics of the “feminine” way of studying and thus to be avoided by real boys, whereas showing low effort was reported to stand for masculinity (Jackson and Dempster 2009). Male students and adolescents also stated that effortless achievement was the

most masculine way of achieving, additionally indicating high intelligence and ability and enhancing a boy's peer status (Jackson 2002, 2003; Jackson and Dempster 2009). Taken together, in Western cultures high academic effort seems to function as an indicator of femininity, whereas low academic effort is perceived as masculine.

Gender-Differentiated Effects of Showing Effort

Although academic effort tends to produce higher achievement, male students put less effort into school than female students do (Lam et al. 2012). Research on attributions has indicated that male and female students benefit to a similar degree from showing low effort in terms of their perceived intelligence (Covington and Omelich 1979a). Research on peer status, however, suggests that adolescent boys showing low effort are perceived as *more* popular than adolescent girls showing low effort (Rentzsch et al. 2011), whereas high effort seems to be positively linked with likeability for girls (Lease et al. 2002). We argue that the feminine stereotyping of academic effort and the masculine stereotyping of low academic effort (Jackson 2002, 2003; Jackson and Dempster 2009) underlie the differential peer status benefits and downsides of showing academic effort for male and female students.

According to research on gender-typicality, being perceived as a typical boy or girl is associated with higher peer status and self-worth (Egan and Perry 2001; Jewell and Brown 2014; Yunger et al. 2004). Children even intentionally try to behave in typically masculine or feminine ways because they assume that such behavior will enhance their popularity (Adler et al. 1992). Thus, we argue that being perceived as very masculine as a result of showing low academic effort or even effortless achievement is met with more social rewards for male students than for female students. Both male and female students showing low effort should be perceived as less feminine and more masculine. But male students should earn more peer approval than do female students from showing low effort because being more masculine and less feminine is more typical of male students than of female students. Because previous interview studies on the perception of effortless achievers (Jackson 2002, 2003; Jackson and Dempster 2009) did not include the perspective of female students, and causal mechanisms could not be examined, a more thorough empirical test is needed.

The Present Studies

The present studies were aimed at exploring the psychological benefits of showing low effort at school with a focus on perceived intelligence, peer status, masculinity, femininity, and gender-typicality. Because male students' lower academic

effort contributes to their lower academic achievement, we wanted to test empirically whether male students benefit more than female students do from showing low effort or from being perceived as effortless achievers in terms of their popularity. We applied experimental vignette studies in which we systematically varied the effort, achievement, and gender of student targets. We recruited a sample of male and female students (Study 1) as well as a teacher sample (Study 2) to overcome the limitations of previous qualitative studies and to gain a more complete picture of the psychological effects of showing academic effort. The teacher sample was especially interesting and valuable for our analyses because known studies on the beneficial effects of showing low effort on students' perceived intelligence, popularity, and masculinity have previously been based on student samples. Research on the correspondence of students' and teachers' peer status ratings (van den Berg et al. 2015) and the stereotyping of academic effort as feminine by both students and teachers (Heyder and Kessels 2015) tentatively suggested similar effects for student and teacher samples. However, teachers have also been found to value effort as such and to reward academic effort with higher grades (Brookhart 1993), tendencies that contribute to girls having overall higher academic success than do boys. Thus, we wanted to compare teachers' and students' points of view of the psychological benefits that students gain from showing low effort to determine whether the teachers see gains that are similar to the gains we expected the students to see. Moreover, we tested for differential effects on students' popularity compared with their likeability.

First, we hypothesized that targets high on achievement and low on effort (effortless achievers) would be perceived as more intelligent than targets who were able to achieve by putting forth effort and low-achieving targets (Hypothesis 1). Further, we expected effortless achievers to be perceived as the most popular targets (Hypothesis 2a). The difference in popularity ratings between the effortless achiever and the other targets was expected to be larger for male than for female targets, indicating larger benefits for boys than for girls (Hypothesis 2b). However, targets high on effort were expected to be rated as more liked than targets showing low effort (Hypothesis 3a). We hypothesized larger effects of effort on a female target's than on a male target's likeability (Hypothesis 3b). Fourth, targets showing low effort were expected to be perceived as more masculine (Hypothesis 4a) and less feminine (Hypothesis 4b) and more similar to a typical boy (Hypothesis 5a) and less similar to a typical girl than hard-working targets (Hypothesis 5b). Hypotheses 1, 2, 4, and 5 were tested in the both student and teacher samples. Hypotheses 3a and 3b were tested only in the student sample because teachers are not expected to be friends with their students, and we assumed that likeability ratings might make teachers feel uncomfortable.

Study 1

Method

Participants

A total of 210 ninth-graders from two Gymnasiums (academic track schools) with a middle-class background located in a large city in Germany participated in the study (115 girls, 93 boys, two students did not indicate their gender and were excluded from further analyses). Their mean age was 14.33 years-old ($SD = .56$, range 13–16 years). A total of 195 students reported being born in Germany (11 born in another country, four missing this information), and 139 students reported speaking only German at home (56 both German and another language with equal frequency, 13 mostly a foreign language, two missing this information). The students participated voluntarily during regular school hours and received a chocolate bar for their participation.

Experimental Manipulation

Students received questionnaires with brief descriptions of all four fictitious targets: (a) a student showing high achievement and high effort (effortful achiever), (b) a student showing high achievement and low effort (effortless achiever), (c) a student showing low achievement and high effort (effortful non-achiever), and (d) a student showing low achievement and low effort (effortless non-achiever). The four targets were either all female or all male leading to a 2 (within: targets' achievement [low, high]) \times 2 (within: targets' effort [low, high]) \times 2 (between: targets' gender [male, female]) \times 2 (between: participants' gender [male, female]) factorial design with eight cells and 42–60 students per cell. The assignment of questionnaires was made randomly. The description of the target read as follows: "Now imagine a boy [girl] who puts a lot of [no] effort into school and gets very good [bad] grades in all subjects."

To avoid order effects, we systematically varied the presentation order of the four targets. After reading a target description, participants were instructed to imagine the target for a moment and to subsequently rate the target's masculinity (15 items, i.e., active, makes decisions easily, feels superior, fearless, persistent, acts as a leader, willing to take risks, stands up well under pressure, forceful, powerful, courageous, strong, proud, not excitable, shows business-like behavior; within vignette $\alpha_s \geq .77$; Kessels 2005) and femininity (15 items, i.e., modest, emotional, good, helpful, loves children, yielding, neat, romantic, considerate, gentle, shy, sensible, understanding, careful, tender-hearted; within vignette $\alpha_s \geq .85$; Kessels 2005) on a 7-point scale from 1 (*not at all*) to 7 (*very*). The items used to measure the ascriptions of masculinity and

femininity had been developed and pretested with respect to the extent to which they were perceived as typically masculine or feminine by adolescents using a large German sample (Kessels 2002, 2005). Further, using single-item measures, the participants indicated on 5-point scales from 1 (*not at all*) to 5 (*very*) how popular the target was (popularity), how much they themselves would like to be friends with him or her (likeability), how intelligent the target was (intelligence), and how gender-typical the target was. Gender typicality was assessed with the item “How similar is she to a typical girl?” (for female targets) or “How similar is he to a typical boy?” (for male targets). The scale ranged from 1 (*not at all*) to 5 (*very*).

Results

In order to test Hypotheses 1–5, we conducted 2 (within: targets’ achievement [low, high]) x 2 (within: targets’ effort [low, high]) x 2 (between: targets’ gender [male, female]) x 2 (between: participants’ gender [male, female]) mixed model ANOVAs with targets’ ascribed intelligence, popularity, likeability, masculinity, femininity, and gender-typicality as the dependent variables. We used a Bonferroni adjusted $\alpha^* = \alpha/6 = .008$ in order to reduce Type I error inflation. Eleven participants had single missing values on an individual variable (e.g., two participants did not indicate their gender). Correspondingly, the sample size for the ANOVAs varied slightly from 204 to 207. We included participants’ gender as a factor in our ANOVAs to provide an exploratory test of gender-differentiated responses, although no explicit hypotheses regarding participants’ gender were proposed. If these analyses yielded significant interaction effects, we additionally ran planned comparisons and tested for simple main effects in order to test our hypotheses (one-tailed because all hypotheses were directional; Cho and Abe 2013). For the sake of clarity, we do not discuss in detail several other effects that are unrelated to our research hypotheses.

Intelligence Ratings

We expected that the effortless achiever would be perceived as the most intelligent target (Hypothesis 1). A two-way interaction between targets’ effort and targets’ achievement emerged, $F(1, 202) = 30.33, p < .001, \eta^2 = .13$. Planned comparisons showed that the effortless achiever was perceived as more intelligent than the effortless non-achiever, $t(208) = 24.02, p < .001$, one-tailed, Cohen’s $d = 2.40$; more intelligent than the effortful non-achiever, $t(209) = 15.96, p < .001$, one-tailed, Cohen’s $d = 1.78$; but similar in intelligence to the effortful achiever, $t(208) = -.24, p = .405$, one-tailed, Cohen’s $d = -.02$ (see Table 1a). Thus, Hypothesis 1 was partly supported by the data.

Table 1 Descriptive statistics for the ratings of the four targets, study 1 (Student Sample)

	Effortless <i>M</i> (<i>SD</i>)	Effortful <i>M</i> (<i>SD</i>)
(a) Intelligence		
Achiever	4.40 (.83) _a	4.44 (.80) _a
Non-achiever	2.31 (.93) _b	2.85 (.94) _b
(b) Popularity		
Achiever	3.79 (.99) _a	2.71 (1.01) _b
Non-achiever	3.58 (1.10) _a	3.07 (.96) _b
(c) Likeability		
Achiever	3.19 (1.14)	3.19 (1.09)
Non-achiever	2.23 (1.04)	3.14 (1.02)
Total ^a	2.72 (.06) _a	3.16 (.06) _b
(d) Masculinity		
Achiever	4.80 (.76)	4.41 (.86)
Non-achiever	4.38 (.96)	3.71 (.87)
Total ^a	4.60 (.05) _a	4.06 (.04) _b
(e) Femininity		
Achiever	3.71 (.95)	5.13 (.82)
Non-achiever	2.83 (.83)	4.98 (.77)
Total ^a	3.27 (.05) _a	5.05 (.04) _b

*N*s = 204–207 students. Intelligence, popularity, and likeability ratings ranged from 1 to 5; masculinity and femininity ratings, from 1 to 7. Subscripts across the four cells of each 2 x 2 compare the effortless achiever with the other three groups such that different subscripts indicate significant Bonferroni-corrected differences. Different subscripts within total rows indicate significant effort main effects

^a Estimated means and standard errors

Popularity and Likeability Ratings

We hypothesized that the effortless achiever would be perceived as the most popular target (Hypothesis 2a) with larger effects for male than for female targets (Hypothesis 2b). Our analysis revealed a statistically significant interaction between targets’ achievement and targets’ effort, $F(1, 202) = 25.94, p < .001, \eta^2 = .11$. Planned comparisons showed that the effortless achiever was perceived as more popular than the effortful achiever, $t(208) = 10.65, p < .001$, one-tailed, Cohen’s $d = 1.07$; more popular than the effortful non-achiever, $t(209) = 6.82, p < .001$, one-tailed, Cohen’s $d = .74$; but similar in popularity to the effortless non-achiever, $t(208) = 2.39, p = .009$, one-tailed, Cohen’s $d = .21$, thus, supporting Hypothesis 2a partly (see Table 1b). Contrary to our expectations, however, no interaction between effort, achievement, and targets’ gender was found, $F(1, 202) = 2.20, p = .140, \eta^2 = .01$. This indicates that male and female targets benefited to the same degree from being perceived as an effortless achiever. Thus, Hypothesis 2b was not supported by the data.

For the likeability ratings, we expected a positive effect of targets’ effort (Hypothesis 3a) that would be larger for female

than for male targets (Hypothesis 3b). We found a significant main effect of targets' effort, $F(1, 200) = 22.45$, $p < .001$, $\eta^2 = .10$. This main effect was qualified by an interaction between targets' effort and achievement, $F(1, 200) = 55.14$, $p < .001$, $\eta^2 = .22$. Analyses of simple main effects showed that effortless non-achievers were less liked than effortful non-achievers, $F(1, 200) = 69.28$, $p < .001$, one-tailed, $\eta^2 = .26$. In the high-achievement condition, however, no simple main effect of effort was found, $F(1, 200) = .02$, $p = .444$, one-tailed, $\eta^2 < .01$. Thus, Hypothesis 3a was supported in the low-achievement condition but not in the high-achievement condition (see Table 1c). Further, no interaction between effort and targets' gender was found, $F(1, 200) = .18$, $p = .674$, $\eta^2 < .01$, providing no support for Hypothesis 3b.

Masculinity and Femininity Ratings

As proposed in Hypothesis 4a, we expected targets showing low effort to be perceived as more masculine than targets showing high effort. We found a main effect of effort on targets' masculinity, $F(1, 203) = 64.41$, $p < .001$, $\eta^2 = .24$. It was qualified by a statistically significant interaction between effort and achievement, $F(1, 203) = 8.67$, $p = .004$, $\eta^2 = .04$. In order to test Hypothesis 4a, analyses of simple main effects for targets' effort were run for both achievement conditions. Effortless non-achievers were rated as more masculine than were effortful non-achievers, $F(1, 203) = 58.44$, $p < .001$, one-tailed, $\eta^2 = .22$, and effortless achievers were rated as more masculine than were effortful achievers, $F(1, 203) = 27.14$, $p < .001$, one-tailed, $\eta^2 = .12$. Thus, Hypothesis 4a was supported (see Table 1d).

We further expected targets showing low effort to be perceived as less feminine than targets showing high effort (Hypothesis 4b). A significant main effect of targets' effort on targets' ascribed femininity was found, $F(1, 203) = 693.03$, $p < .001$, $\eta^2 = .77$. It was qualified by a statistically significant interaction between effort and achievement, $F(1, 203) = 49.40$, $p < .001$, $\eta^2 = .20$. Analyses of simple main effects revealed that effortless non-achievers were perceived as less feminine than were effortful non-achievers, $F(1, 203) = 714.21$, $p < .001$, one-tailed, $\eta^2 = .78$, and effortless achievers were perceived as less feminine than were effortful achievers, $F(1, 203) = 246.83$, $p < .001$, one-tailed, $\eta^2 = .55$. Thus, Hypothesis 4b was also supported (see Table 1e).

Gender-Typicality Ratings

We hypothesized that targets showing low effort would be perceived as more similar to a typical boy (Hypothesis 5a) and less similar to a typical girl than hard-working targets would be (Hypothesis 5b). The corresponding interaction between effort and targets' gender was found to be statistically significant, $F(1, 200) = 21.23$, $p < .001$, $\eta^2 = .10$. Analyses of

simple main effects revealed that male targets showing low effort ($M = 3.33$, $SE = .08$) were perceived as more similar to a typical boy than male targets showing high effort ($M = 2.76$, $SE = .08$), $F(1, 200) = 26.42$, $p < .001$ one-tailed, $\eta^2 = .12$, whereas the effect for effortless ($M = 3.02$, $SE = .08$) and effortful ($M = 3.16$, $SE = .08$) female targets was not statistically significant, $F(1, 200) = 1.78$, $p = .092$, one-tailed, $\eta^2 < .01$. Thus, Hypothesis 5a was supported but Hypothesis 5b was not.

Discussion

We applied an experimental vignette design to test whether showing low effort and effortless achievement would influence students' perceptions of intelligence, popularity, likeability, masculinity, femininity, and gender-typicality in fictitious targets. Effortless achievers were perceived as more intelligent than low-achieving targets but similar in intelligence to effortful achievers. Thus, Hypothesis 1 was partly supported. Effortless achievers were further rated as more popular than hard-working targets (partially supporting Hypothesis 2a). However, no interactions with targets' gender were found (not supporting Hypothesis 2b). Further, targets showing low effort were rated as less liked than hard-working targets, but only when showing low achievement and not when showing high achievement (partially supporting Hypothesis 3a). Similar effects were found for male and female targets (failing to support Hypothesis 3b). Although showing effort meant that targets were perceived as less masculine, less similar to a typical boy, and more feminine (supporting Hypotheses 4a, 4b, and 5a), our analyses did not indicate different gains in popularity or likeability for boys compared with girls (not supporting Hypotheses 2b and 3b). These results will be discussed in detail in the General Discussion.

Study 2

Study 2 was designed to test whether students gain the same psychological benefits from showing low effort from a teacher's point of view as from a student's point of view. Research on the correspondence of students' and teachers' peer status ratings (van den Berg et al. 2015) and the stereotyping of academic effort as feminine by both students and teachers (Heyder and Kessels 2015) tentatively suggested similar effects for student and teacher samples. However, teachers additionally have been found to value effort as such and to reward academic effort with higher grades (Brookhart 1993). Thus, empirical research on teachers' perception of targets was needed. In study 2, all hypotheses except Hypotheses 3a and 3b were tested as in Study 1.

Method

Sample

A total of 176 teachers from four German Gymnasiums (academic track schools) participated in the study (100 female, 68 male, eight with no gender identification who were excluded from further analyses). Their mean age was $M = 44.36$ years ($SD = 11.01$, range 24–65 years), and their mean length of professional experience was $M = 16.95$ years ($SD = 12.23$, range <1 year–41 years). The teachers participated voluntarily after or before teachers' conferences at school.

Experimental Manipulation

The experimental manipulation was the same as in Study 1. Cell sizes varied from 33 to 52 teachers per cell. After reading the same student descriptions as in Study 1, teachers rated the targets' intelligence, popularity, masculinity (Kessels 2005), femininity (Kessels 2005), and similarity to a typical boy or girl. Cronbach's α s within each vignette were $\alpha \geq .88$ for masculinity and $\alpha \geq .85$ for femininity. Different from the students in Study 1, the teachers in Study 2 were not asked to indicate how much they themselves wanted to be friends with the target because teachers are not expected to be friends with their students.

Results

We applied the same analyses as in Study 1. The Bonferroni adjusted alpha-level was $\alpha^* = \alpha/5 = .01$. Thirteen participants had single missing values on individual variables (e.g., eight participants did not indicate their gender). Correspondingly, the sample size for the ANOVAs varied slightly from 161 to 168.

Intelligence Ratings

We expected the effortless achiever to be perceived as the most intelligent type of target (Hypothesis 1). As in Study 1, we found a statistically significant interaction between targets' effort and achievement, $F(1, 157) = 16.30$, $p < .001$, $\eta^2 = .09$. Planned comparisons revealed that the effortless achiever was perceived as more intelligent than the effortless non-achiever, $t(168) = 17.74$, $p < .001$, one-tailed, Cohen's $d = 2.06$; more intelligent than the effortful non-achiever, $t(167) = 19.39$, $p < .001$, one-tailed, Cohen's $d = 2.42$; and more intelligent than the effortful achiever, $t(169) = 8.05$, $p < .001$, one-tailed, Cohen's $d = .74$ (see Table 2a). Thus, Hypothesis 1 was supported by the data.

Table 2 Descriptive statistics for the ratings of the four targets, study 2 (Teacher Sample)

	Effortless <i>M</i> (<i>SD</i>)	Effortful <i>M</i> (<i>SD</i>)
(a) Intelligence		
Achiever	4.43 (.77) _a	3.87 (.74) _b
Non-achiever	2.82 (.77) _b	2.62 (.73) _b
(b) Popularity		
Achiever	3.75 (.85) _a	3.21 (.90) _b
Non-achiever	2.85 (.82) _b	2.88 (.87) _b
(c) Masculinity		
Achiever	4.97 (.85)	4.74 (.87)
Non-achiever	3.67 (1.04)	3.57 (.85)
Total ^a	4.31 (.05) _a	4.16 (.05) _a
(d) Femininity		
Achiever	3.85 (.72)	4.68 (.71)
Non-achiever	3.51 (.70)	4.66 (.72)
Total ^a	3.69 (.04) _a	4.67 (.04) _b

*N*s = 161–168 teachers. Intelligence, and popularity ratings ranged from 1 to 5; masculinity and femininity ratings, from 1 to 7. Subscripts across the four cells of each 2×2 compare the effortless achiever with the other three groups such that different subscripts indicate significant Bonferroni-corrected differences. Different subscripts within total rows indicate significant effort main effects

^a Estimated means and standard errors

Popularity Ratings

We hypothesized that the effortless achiever would be perceived as the most popular target (Hypothesis 2a) with larger effects for male than female targets (Hypothesis 2b). Analyses of the teacher data revealed an interaction between targets' effort and achievement in predicting targets' popularity, $F(1, 160) = 17.90$, $p < .001$, $\eta^2 = .10$. Planned comparisons indicated that teachers rated the effortless achiever as more popular than the effortful achiever, $t(170) = 5.76$, $p < .001$, one-tailed, Cohen's $d = .59$; more popular than the effortless non-achiever, $t(171) = 9.17$, $p < .001$, one-tailed, Cohen's $d = 1.00$; and more popular than the effortful non-achiever, $t(171) = 8.93$, $p < .001$, one-tailed, Cohen's $d = .98$ (see Table 2b). Thus, Hypothesis 2a was also supported in the teacher sample. However, because no significant interaction among effort, achievement, and targets' gender was found, $F(1, 160) = .87$, $p = .352$, $\eta^2 < .01$, Hypothesis 2b was not supported.

Masculinity and Femininity Ratings

We expected a negative effect of showing high effort on teachers' ascribed masculinity of students (Hypothesis 4a). However, the main effect of effort did not reach statistical significance, $F(1, 164) = 3.70$, $p = .028$, one-tailed, $\eta^2 = .02$. Thus, Hypothesis 4a was not supported (see Table 2c).

We additionally expected a positive effect of showing effort on ascribed femininity (Hypothesis 4b). As in Study 1, we found a significant main effect of effort, $F(1, 163) = 219.36$, $p < .001$, $\eta^2 = .57$, and a significant interaction between effort and achievement, $F(1, 163) = 11.02$, $p = .001$, $\eta^2 = .06$. Analyses of simple main effects showed that effortful achievers were perceived as more feminine than effortless achievers, $F(1, 163) = 112.71$, $p < .001$, one-tailed, $\eta^2 = .41$, and effortful non-achievers were perceived as more feminine than effortless non-achievers, $F(1, 163) = 181.55$, $p < .001$, one-tailed, $\eta^2 = .53$ (see Table 2d). Thus, Hypothesis 4b was supported.

Gender-Typicality Ratings

We hypothesized that targets showing low effort would be perceived as more similar to a typical boy (Hypothesis 5a) and less similar to a typical girl than hard-working targets would be (Hypothesis 5b). Our analysis revealed a significant interaction between effort and targets' gender, $F(1, 158) = 40.58$, $p < .001$, $\eta^2 = .20$. Analyses of simple main effects revealed that female targets showing high effort ($M = 3.35$, $SE = .08$) were rated as more similar to a typical girl than were female targets showing low effort ($M = 2.78$, $SE = .07$), $F(1, 158) = 40.48$, $p < .001$, one-tailed, $\eta^2 = .20$. Male targets showing low effort ($M = 3.19$, $SE = .07$) were rated as more similar to a typical boy than were male targets showing high effort ($M = 2.96$, $SE = .07$), $F(1, 158) = 6.67$, $p = .005$, one-tailed, $\eta^2 = .04$. Thus, Hypothesis 5a and 5b was supported for teachers' ratings.

General Discussion

In two experimental vignette studies with independent samples of German ninth-graders and teachers, we explored the effects of showing low or high effort at school on ascriptions of high- or low-achieving targets' intelligence, peer status, masculinity, femininity, and gender-typicality. Particularly, we were interested in the perception of targets high on achievement and low on effort. These effortless achievers were perceived as the most intelligent and most popular targets by teachers (as predicted by Hypothesis 1 and 2a), whereas students perceived all high-achieving targets, regardless of whether their effort was high or low, as similarly intelligent and effortless non-achievers as similarly popular. No interaction with targets' gender was found (not supporting Hypothesis 2b). Academic effort further increased a low-achieving target's likeability, again, irrespective of targets' gender (partly supporting Hypothesis 3a but not Hypothesis 3b). Showing effort at school increased the femininity ratings of targets in both samples (supporting Hypothesis 4b) and decreased the masculinity ratings in the student sample

(supporting Hypothesis 4a). Students and teachers perceived targets showing low effort as more similar to a typical boy than targets showing high effort (supporting Hypothesis 5a). Teachers perceived targets showing high effort as more similar to a typical girl than targets showing low effort (supporting Hypothesis 5b).

These findings from our vignette experiments are in line with previous results from qualitative interview studies with British male students on the gender stereotyping of academic effort as feminine (Jackson 2002, 2003; Jackson and Dempster 2009). Showing low effort in school increased students' masculinity and boy-typicality and decreased their femininity and girl-typicality in the eyes of their peers. These ascriptions might contribute to the consistently reported gender differences in academic effort and engagement in favor of female students (Lam et al. 2012; Lietaert et al. 2015). Our results further corroborate the distinction between popularity and likeability in adolescence (Cillessen and Marks 2011; van der Linden et al. 2010) as well as their differential relations with academic effort (Bruyn and Cillessen 2006; Juvonen and Murdock 1995). Whereas likeability was related to an adaptive behavior (i.e., showing academic effort when showing low achievement), the opposite was found for popularity, illustrating that a potential academic risk is associated with striving for popularity in adolescence (see also Schwartz et al. 2006).

Some interesting differences between teachers' and students' ascriptions emerged that are worth discussing in more detail. Showing effort had different effects on students' and teachers' intelligence ratings of target students. Only teachers perceived the effortless achievers as the most intelligent targets, supporting Hypothesis 1, whereas students considered the effortless achiever only as more intelligent than low achieving targets, but not as more intelligent than a peer who worked hard for his or her good grades. Thus only teachers' ratings were in line with the conceptual understanding that if the outcome is equal, lower effort implies higher ability, which means that ability determines how much a person can achieve (Nicholls 1990). Several interpretations of this finding seem plausible. Whereas older studies have concluded that children develop the understanding that low effort implies higher ability if the outcome is equal around the age of 13 years (Nicholls 1990), our findings in a sample of mainly 14-year-olds might indicate that many students of that age have not yet acquired this concept. A different reason could be that students in our sample had a more incremental than entity view of intelligence (Dweck 1986) because only an understanding of intelligence as fixed and limited (entity view) fosters the interpretation of high effort as an indicator of (relatively) low intelligence instead of as a means of enhancing one's intelligence. Such a growth mindset is more adaptive for students' learning than the perception of intelligence as limited and stable (Dweck 1986). Another simpler

explanation might be that students in our sample did not rate targets' intelligence per se (e.g., as estimated IQ points) but instead rated how "smart" the target *behaved*; thus taking the benefits of showing effort (Brookhart 1993; Carbonaro 2005; Jackson and Nyström 2015) into account when making their judgments. Further empirical studies are needed to test these competing explanations.

In addition, although showing low effort increased the ascriptions of masculinity and boy-typicality in the student sample, no gender-specific effects of effort on targets' peer status were found. Contrary to previous findings (Rentzsch et al. 2011), male and female targets were ascribed the same degrees of popularity or likeability on the basis of their effort and achievement. However, several studies from other strands of research have found that popularity, which was linked to low effort, is more important to male than to female students, whereas likeability, which was linked to high effort, is more important to female students. Already during childhood and adolescence, males were found to prioritize popularity over other domains (e.g., friendship) more strongly than females did, with the largest gender difference in our student sample's age group, namely, early adolescence (LaFontana and Cillessen 2010). Men also value prestige and social status more highly than do women (Kessels 2013; Schwartz and Rubel 2005). The similarity between power and popularity is evident in the definition of power values as striving for social status, prestige, and control or dominance over people and resources (Schwartz and Rubel 2005, p. 1010), as well as in the definition of popularity as being perceived as popular, prestigious, or visible (Cillessen and Marks 2011, p. 28). Therefore, it seems plausible that the same degree of ascribed popularity as found in our results can be more personally important for male students than for female students. In a similar vein, being perceived as masculine and not feminine would be more rewarding to male students than to female students. In sum, even if ascriptions of stereotypes to male and female students showing low effort were similar, the benefits of showing low effort would be larger for male than for female students. Because our study focused on perceptions of fictitious targets' outwardly observable characteristics, such gender differences in the personal importance of being popular or masculine or feminine could not be tested in our study and remain a topic for future research.

Limitations and Future Research Directions

Because hypothetical vignette targets were judged in our study, the results are limited in terms of their external validity as is common in the field of social psychology. Because no individualizing information about the targets was given, participants' ratings can be understood as social-cognitive representations of certain types of students or stereotypes. Our study aimed to reveal these stereotypes. Real-life students

are self-evidently more diverse and complex, and in daily school routines, individual students' characteristics interact with the stereotypical effects of effort and achievement revealed in our study. When more individuating information is available, a person's judgment will be based on stereotypes to a smaller extent (Fiske and Neuberg 1990).

Our experimental design involved both within-subjects (effort and achievement) and between-subjects (targets' gender) factors. Therefore, participants had to rate four different targets on a range of dependent variables. A full within-subjects design would have required participants to judge up to eight identical vignettes, differing exclusively on the systematically varied experimental factors, which, apart from methodological considerations, did not seem feasible in practical terms. The fact that we found very strong effects in accordance with our hypotheses for the within-subjects factors but much smaller and nonsignificant effects when the between-subjects factor of targets' gender was involved may have resulted from the advantages and disadvantages of each of these designs as discussed in the literature (for an overview, see Charness et al. 2012). Our findings mirror the boost in statistical power found for within-subjects designs that, however, might go hand-in-hand with higher demand effects (Rosenthal 1976). Multiple treatments can make individuals sensitive to variations between the treatments (Charness et al. 2012) so that participants ascribe meaning to these varying parameters while simultaneously paying less attention to the parameters that were held constant (here, the gender of the target). Between-subjects factors are considered to be a more conservative choice because they make it more difficult to detect an effect; for this reason, they are preferred by some researchers (Charness et al. 2012) under some circumstances. Discussing our results in this light, it is not possible to definitively determine whether the strong effects for the within-subjects factors of effort and achievement should be considered artifacts resulting from demand effects in a within-subjects design or whether the similar results for male and female targets should be considered an artifact because participants' attention was shifted away from targets' gender, which was varied between subjects. Future research on this topic might choose other design variations in order to address these issues.

In addition, our results are limited by the Western samples we employed. Different cultures, for example, Western (e.g., North America, Europe) and Eastern cultures (e.g., China), are known to differ in their conceptions of effort as well as in their perceptions of the relative importance of effort for academic achievement. In Japan and China, for instance, academic effort and hard work are considered the primary determinants of achievement and are highly valued, whereas in the United States,

(innate) ability is viewed as the primary cause (Holloway 1988; Stevenson et al. 1993). Therefore, cross-cultural studies are needed to test whether different benefits and downsides of showing academic effort emerge for students from different cultures. Other potential moderator variables include students' socioeconomic background and age. Socioeconomic background shapes students' constructions of masculinity and femininity, respectively (Legewie and DiPrete 2012), and might constrain a student from showing academic effort to a lower or higher degree. Systematically varying the age of the students in a study should be informative because correlates of students' popularity and likeability as well as students' conceptions of effort and ability depend on students' age (Cillessen and Mayeux 2004; Juvonen and Murdock 1995; Nicholls 1990).

Our results stimulate further new research questions, such as: What are the consequences of our findings for students' academic achievement and grades? Different implications for students' learning behaviors and teachers' grading practices can be derived on the basis of other research. For instance, students might work less diligently in school in order to appear more masculine and enhance their popularity even if such behavior undermines their academic achievement (Jackson 2002). Especially male students seem likely to make use of this strategy because male students show more behavioral self-handicapping than female students do (for a summary, see McCrea et al. 2008). Because being perceived as masculine and popular is more important to boys than it is to girls (Adler et al. 1992; LaFontana and Cillessen 2010), these perceived benefits of showing low effort might contribute to the current gender gap in academic achievement in favor of female students (Lam et al. 2012). But male students might also only *pretend* to put no effort into school in order to enhance their popularity while still covertly working hard for school (Jackson 2002). However, balancing "school work and cool work" (i.e., academic and social goals; Jackson and Dempster 2009, p. 344) is not easy and might not be accomplished equally well by all students (Jackson and Dempster 2009; Jackson and Nyström 2015). As Rentzsch et al. (2011) showed, average- and high-achieving students might be able to compensate for investing high effort by demonstrating other desirable attributes such as being modest about their good grades and being sporty or sociable.

Further research is also needed to study the effects of the sociocognitive mechanisms depicted in our results on teachers' grading practices. On the one hand, teachers are known to reward academic effort when grading academic achievement (Randall and Engelhard 2010), a tendency that might result in better grades for students who are perceived as

trying hard. On the other hand, the finding that teachers equate more effort with relatively lower intelligence might indicate that teachers have lower expectations of hard-working students, and lower expectations in teachers are known to predict lower academic achievement in students (for a summary, see Jussim and Harber 2005).

The present study focused on academic effort in general without exploring differential effects in different school subjects. Many studies have pointed out that girls show more general academic effort than boys (Lam et al. 2012) and that general academic effort is perceived as feminine (for a summary, see Heyder and Kessels 2015). However, in future studies, it would likely be fruitful to test for differential effects in different subjects as well. Showing high effort in a subject stereotyped as male (e.g., math; Steffens et al. 2010) might be perceived as more masculine and less feminine than showing high effort in a feminine-stereotyped subject (e.g., language). Showing effort in a subject associated with the other gender might also be more detrimental for a student's popularity and less beneficial for a student's likeability than showing academic effort in gender-appropriate subjects because gender-typical behavior is known to be positively related to students' popularity (Jewell and Brown 2014). Further, the perceived difficulty of a subject might moderate the effects. Showing high effort in a subject that is considered difficult (e.g., math or physics; Haag and Götz 2012) might be understood as an indicator of the difficulty of the subject rather than of a student's low ability or aptitude. As such, future studies might explore whether academic subjects function as potential moderator variables of the effects revealed in our analyses.

Practice Implications

Our results are important not only for researchers but also for practitioners such as teachers and counselors. Being aware of the possible psychological benefits that students experience on the basis of the amount of effort shown in school can help teachers view a display of low effort as impression management or as a self-presentation strategy for adolescents. As a consequence, teachers will not automatically interpret this behavior as (or will interpret this behavior as not merely) an indicator of a lack of motivation. This different interpretation might subsequently protect students from being sanctioned by lower grades and teachers from becoming frustrated and burnt-out (Covell et al. 2009). To further tackle the problem of male students' lower academic engagement compared with female students, it seems fruitful to aim to reduce any gender stereotyping of academic effort as such (Kessels et al. 2014). Making academic engagement a behavior that is valued by both genders would foster gender equity in the classroom and would help both boys and girls equally

to develop their full potential in school. Generally reducing the salience of gender in the classroom by using language and actions that do not emphasize students' gender or differences between genders should contribute to less gender-stereotyped learning behavior (cf. Bigler 1995; Hyde and Lindberg 2007).

We should also keep in mind that the feminine stereotyping of effort is not a neutral label but is actually pejorative, as analyses on the discourse of effortless achievement have also shown (Jackson and Dempster 2009). The feminine stereotyping of effort implies a double downgrading: first, of the accomplishments for which students have worked hard and, second, as a result of this logic, of femaleness per se. This double jeopardy might contribute to psychological stress for high-achieving female students. The idea that female students' better grades might come with some costs and side effects was recently discussed in the context of female students' higher levels of school burnout (Salmela-Aro et al. 2008). The devaluation of their achievements as being effortful, thus feminine, and thus inferior might contribute to the impairments of female students' psychological health and should be considered in counseling.

Conclusions

Academic effort is an important positive predictor of academic success. Our study sought to understand why male students display less academic effort in school than female students because this phenomenon had previously been identified as one of the crucial factors for explaining male students' lower grades. We found that showing no effort in school seems to result in desirable consequences that are linked to specific ascriptions by others. The most positive ascriptions—at least from a male student's perspective—are made if low effort is nevertheless accompanied by high success: The effortless achievers are perceived by their peers as being very masculine and boy-like and, at the same time, as less feminine and very popular. Even if in our study these ascriptions per se were made to both male and female effortless achievers, male students would be very likely to profit more from these specific ascriptions than female students would, as we outlined. Because effort and academic success are usually positively related, the combination of low effort and high achievement remains a very unlikely and almost unreachable status for most students. As students experience pressure to succeed, many male students attempt “to balance school work and cool work” (Jackson and Dempster 2009, p. 344), thus trying to avoid the denial of masculinity by their peers that comes with showing effort in school. The feminine gender stereotyping of effort in school takes its toll for both male and female students because it hinders male students from working appropriately in order to achieve and because it devalues female students' achievements as resulting merely from diligence.

Compliance with Ethical Standards

Conflict of Interest The authors declare that they have no conflicts of interest.

Research Involving Human Participants The Senate Administration for Education, Youth, and Science in charge of approving empirical research in schools in the authors' city reviewed and approved the research protocol and questionnaires.

Informed Consent Informed consent was secured from all participants.

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