We conducted a random effects meta-analysis of 27 studies and found that the intervention was significantly more effective than comparison conditions ($g = 0.61$, $p < .0001$). We found significant heterogeneity in the sample, $Q(26) = 90.10$, $p < .0001$, and I^2 was 73.51%, indicating that there was substantial heterogeneity. Moreover, we found that $\tau^2 = 0.24$ (SE = .09).

We next checked to see if there were any outliers or studies with significant influence on the results. One study (Roodenrys et al., 2012, Exp2, Part 1) was found to be an outlier. However, the study was not notably different than others in the sample, so the effect size was not removed or modified. A forest plot of all effect sizes is shown in Figure 1.

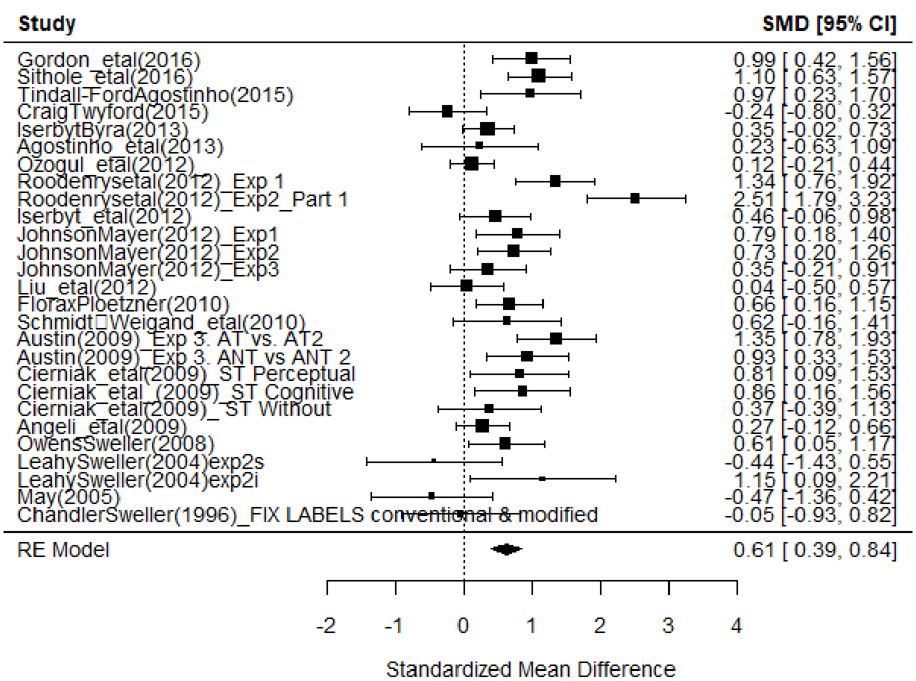

Figure 1. Forest plot of all effects.

Moderator Analysis

We first checked to see if the grade level of the participants significantly moderated the effects of the intervention. We found that the grade level was not a significant moderator ($Q_b(4) = 4.28$, $p = .37$). A table of results is shown in Table 1.

Table 1. The effects of the intervention based on the grade level of the participants.

graderange	nexp	nctrl	kcomp	*g*	se	zval	*p*	ci.lb	ci.ub	Test of Moderator
Grades 6-8	98	97	3	0.61	0.32	1.90	0.06	-0.02	1.24	
Grades K-5	43	43	3	0.20	0.37	0.53	0.60	-0.53	0.92	
Not Stated	49	50	2	0.05	0.39	0.14	0.89	-0.72	0.83	
Other (combined grades)	28	25	1	0.99	0.56	1.77	0.08	-0.11	2.09	
Post-Secondary (Undergraduate/ Graduate/Technical)	514	454	18	0.72	0.14	5.26	0.00	0.45	0.98	
										$Q_b(4) = 4.28$, $p = .37$

Commented [N1]: Note that I have included z and left ci.lb and ci.ub. However, it is common to omit z and combine ci.lb and ci.ub into the format: [ci.lb, ci.ub]. This is largely stylistic preference. Note that the ci provided is a 95% ci.

nexp = sample size of experimental group
nctrl = sample size of the comparison group
kcomp = number of comparisons

Next, we examined if #variable ("cont" in our example) was a significant predictor of the effects of the intervention compared to comparison groups. We found that it was not ($Q_b(1) = 0.18$, $p = .67$).

Publication Bias

In order to examine if publication bias was a significant concern, we first examined the funnel plot for asymmetry. As shown in Figure 2, the funnel plot seems to be slightly asymmetrical, however it does not appear to be overly skewed.

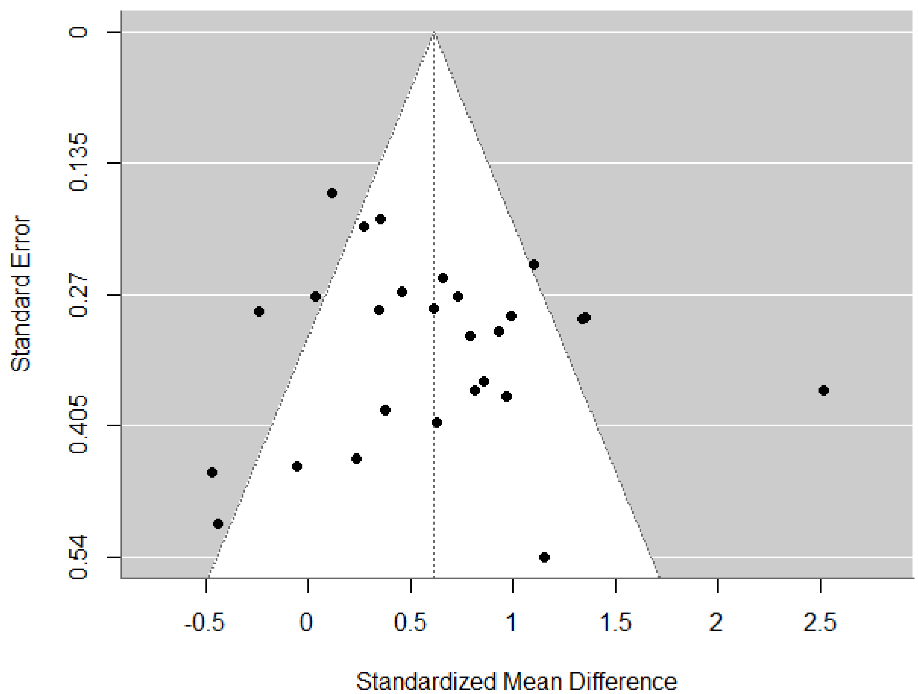

Figure 2. Funnel plot of observed effects.

Next, we conducted a trim and fill analysis. The analysis showed that two studies were missing on the right side of the funnel (Figure 3). However, imputing these studies did not notably change the overall effect size (g = .68, p < .0001) from the overall effect size found in the meta-analysis (g = .61, p < .0001).

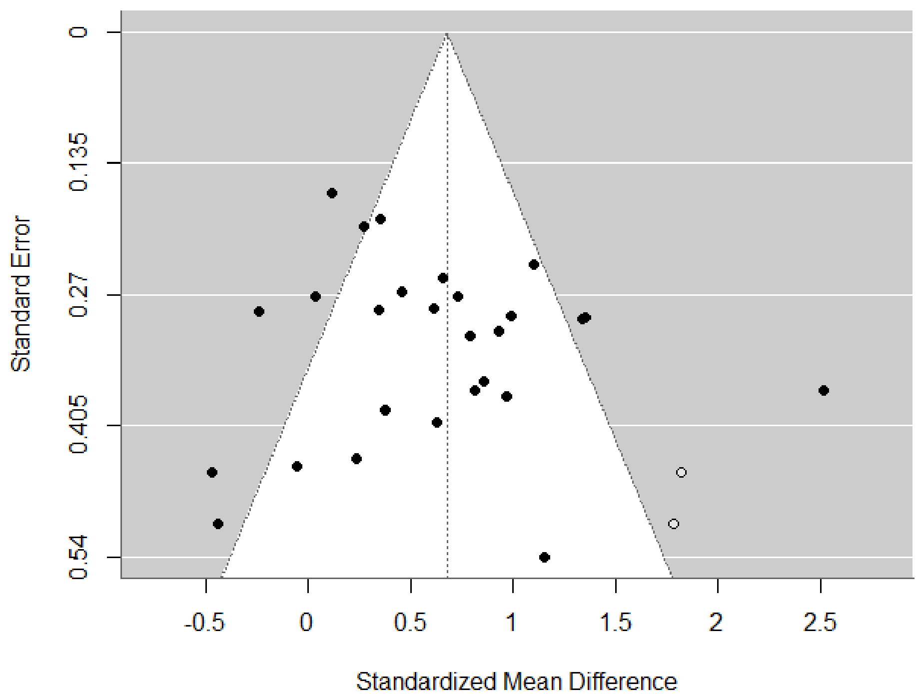

Figure 3. Funnel plot with the two missing studies from the trim and fill analysis imputed (hollow circles).

We then ran Egger's regression to check for funnel plot asymmetry. The test was not significant, suggesting that there is not significant funnel plot asymmetry ($z = -0.04$, $b = .63$, $p = .97$).

Finally, we calculated Rosenthal's Fail Safe N. We found that 1028 null effect studies would be needed to make the overall meta-analytic effect size not significant.

Overall, we conclude that publication bias is not likely to be a significant concern in our sample. While the trim and fill analysis found that two studies were missing from the right side of the funnel, imputing them did not notably change the overall effect size. Moreover, Egger's regression suggested that the funnel plot was not significantly asymmetrical, and the Fail Safe N test indicated that many studies would be needed to notably change the significance of the overall meta-analytic effect size.