EMBARGOED UNTIL 10:00 AM ET, MARCH 11, 2014

What Works Clearinghouse™

ies INSTITUTE OF EDUCATION SCIENCES

March 2014

WWC Review of the Report "Expanding College Opportunities for High-Achieving, Low Income Students"[1,2]

The findings from this review do not reflect the full body of research evidence on the effects of providing high school students with information about the college application process and college costs.

What is this study about?

The study examined the effects of providing low-income, high-achieving high school seniors with a multi-component intervention program including college application guidance, information about the costs of college, and a fee waiver for college applications.

Students were identified using data from the College Board and ACT. A random sample of students was selected from those who scored in the top decile of the SAT I or ACT and had estimated family incomes in the bottom third of the income distribution of families with students in the twelfth grade. This review focuses on findings from students who were randomly assigned to the multi-component intervention program (n = 3,000) or a no-treatment comparison condition (n = 3,000).[3]

The *application guidance* component of the intervention included information about deadlines and requirements for college applications at nearby institutions, at the state's flagship institution, and at in- and out-of-state selective colleges. The *application guidance* component of the intervention also included tables that compared colleges' graduation rates and provided tools for students to explore colleges' curricula, instructional resources, and housing. The *information about the costs of college* component of the intervention provided students with information on the amount spent on instruction, the list price of attendance, and net costs of attendance for different colleges and universities. This net cost information was presented for hypothetical families with incomes of $20,000, $40,000, and $60,000, but emphasized that the student's actual cost of attendance at a given school would be unknown unless he or she actually applied. Finally, students received a *waiver* that allowed them to apply to 171 selective institutions without paying application fees. This multi-component intervention was administered by mailing these materials to the students' homes, 4–14 months after they registered for a college entrance examination. The cost to implement the multi-component intervention was estimated at about $6 per student.

Features of Providing Information About College Application Process and College Costs

The authors of this study designed a multi-component intervention that provided low-income, high-achieving high school seniors with college application guidance, information about college costs, and a fee waiver for college applications. Specifically, the multi-component intervention included the following components:

- an *application guidance* component that included mailed packets with tables listing graduation rates for nearby colleges, state flagship colleges, and selective colleges;
- a *net cost* component that provided students with information about the actual cost of attending specific schools, including instructional spending and net costs for nearby, state flagship, and selective colleges; and
- a *fee waiver* component that provided students with no-paperwork fee waivers that could be used at 171 different selective schools.

EMBARGOED UNTIL 10:00 AM ET, MARCH 11, 2014

What did the study find?

The authors reported, and the WWC confirmed, a statistically significant impact of providing students with college application guidance, net cost information, and fee waivers on postsecondary application submissions and postsecondary enrollment outcomes. The authors reported that the multicomponent intervention increased the percentage of students who (a) applied to a selective institution (from 55% to 67%), (b) were admitted to a selective institution (from 30% to 39%), and (c) enrolled in a selective institution (from 29% to 34%), relative to the comparison condition. Students in the multicomponent intervention condition also completed more applications and were admitted to more colleges than students in the comparison group. All of these differences were statistically significant.

WWC Rating

The research described in this report meets WWC evidence standards with reservations

Strengths: This study is a randomized controlled trial.

Notes: Although students were randomized to the intervention and comparison conditions, there was a high level of non-response on the surveys used to collect post-intervention outcome measures. The study demonstrated baseline equivalence of the analysis samples for the outcomes presented in this WWC report. Therefore, this evidence meets WWC standards with reservations.

EMBARGOED UNTIL 10:00 AM ET, MARCH 11, 2014

Appendix A: Study details

Hoxby, C., & Turner, S. (2013). *Expanding college opportunities for high-achieving, low income students*. Stanford, CA: Stanford Institute for Economic Policy Research. Retrieved from http://siepr.stanford.edu

Setting

The study was conducted with low-income, high-achieving high school seniors in the United States. Participants received the intervention materials via postal mail and reviewed the intervention materials on their own.

Study sample

A national sample of low-income, high-achieving high school seniors was targeted for this intervention and identified using College Board and ACT data, census data, and other sources. Low-income students were defined as those with an estimated family income in the bottom third of the income distribution for families with a student in the twelfth grade, based on the 2007–11 American Community Survey. High-achieving students were defined as those who scored in the top decile of test-takers of the SAT I or ACT (1300 math plus verbal on the SAT I, or 28 on the ACT). These students are typically geographically dispersed and so cannot easily be reached by usual methods of informing students about college. To assess whether information would change students' behavior, the sample was randomized to the Expanding College Opportunities Comprehensive (ECO-C) intervention (n = 3,000), a no-treatment comparison group (n = 3,000), or one of four other interventions which are not included in this single study report (see Endnote 3). The analytic sample for the ECO-C intervention and comparison conditions included 1,835 students who completed a survey the summer after they were expected to graduate from high school, and/or completed a survey the summer after which they were expected to have completed one year of college. The demographic composition of the original assigned sample was not reported. In the analytic sample for the ECO-C intervention and comparison conditions, 45% of the students were female and 53% were underrepresented minorities.

Intervention group

Intervention condition students were high school seniors who had taken the SAT/ACT, who scored in the top deciles of the SAT/ACT, had an estimated family income in the bottom third of the income distribution for families with a student in the twelfth grade, and did not attend a "feeder" high school (feeder schools were those in which more than 30 students in each academic cohort typically scored in the top decile on college assessment exams). Students were randomly assigned to the ECO-C intervention program, a no-treatment comparison condition, or to one of four other interventions that provided only one intervention component (the four single component interventions are not included in this single study review; see Endnote 3). The ECO-C intervention included (1) *Application Guidance,* (2) *Net Cost*, and (3) *Fee Waiver* components intended to help high school seniors learn about their options for attending college and provide them with materials to help organize their multiple college applications.

EMBARGOED UNTIL 10:00 AM ET, MARCH 11, 2014

The *net cost* intervention component provided students with information about net costs for low- to -middle-income students. This information included list prices, instructional spending, and net costs of the state flagship university, at least one other in-state public college, nearby colleges, a selective in-state private college, one out-of-state private liberal arts college, and one out-of-state selective university. The materials emphasized that the students' actual cost of attendance at a given school would be unknown unless they actually applied to that school.

The *fee waiver* intervention component provided students with no-paperwork fee waivers that allowed them to apply to up to 171 selective colleges.

Comparison group

The comparison condition did not receive the intervention packet, and therefore received treatment as usual. Comparison condition students were high school seniors who had taken the SAT/ACT, who scored in the top deciles of the SAT/ACT, had an estimated family income in the bottom third of the income distribution for families with a student in twelfth grade, and did not attend a "feeder" high school (feeder schools were those in which more than 30 students in each academic cohort typically scored in the top decile on college assessment exams). These students received no intervention services, but may have received college application/admission/enrollment information from other sources as part of usual practices.

Outcomes and measurement

College application, admission, and enrollment outcomes were based on student survey responses collected during the summer after they were expected to graduate from high school, and the summer after which they were expected to have completed their first year of college. For a more detailed description of these outcome measures, see Appendix B.

Support for implementation

The intervention materials were delivered in a packet via postal mail to the homes of high school seniors. No training of high school students or their families was reported. No implementation support was reported.

Reason for review

This study was identified for review by the WWC because it received significant media attention.

EMBARGOED UNTIL 10:00 AM ET, MARCH 11, 2014

Appendix B: Outcome measures for each domain

Postsecondary applications	
Number of applications submitted	This outcome is based on responses to a survey that asked students to report the total number of postsecondary applications they submitted. The survey was conducted during the summer after which students were expected to graduate from high school. For this analysis, the study authors used a count measure of the total number of applications submitted.
Applied to a peer/selective institution	This binary outcome is based on responses to a survey that asked students to report the names of postsecondary institutions to which they submitted applications. These data were collected during the summer after which students were expected to graduate from high school. For this analysis, the study authors measured whether students applied to any "peer" institutions (public, private, liberal arts, or other institution type), where peer institutions are defined as those institutions where median student scores fall within five percentiles of a student's own score.
Number of colleges to which admitted	This outcome is based on responses to a survey that asked students to report the total number of postsecondary colleges to which they were admitted. The survey was administered during the summer after which students were expected to have completed one year of college. For this analysis, the study authors used a count measure of the total number of colleges to which students were admitted.
Admitted to a peer/selective institution	This binary outcome is based on responses to a survey that asked students to report the names of postsecondary institutions to which they were admitted. The survey was administered during the summer after which students were expected to have completed one year of college. For this analysis, the study authors measured whether students were admitted to any "peer" institutions (public, private, liberal arts, or other institution type), where peer institutions are defined as those institutions where median student scores fall within five percentiles of a student's own score.
Postsecondary enrollment	
Enrolled in a peer/selective institution	This binary outcome is based on responses to a survey that asked students to report the names of postsecondary institutions to which they enrolled. The survey was administered during the summer after which students were expected to have completed one year of college. For this analysis, the study authors measured whether students were enrolled in a "peer" institution (public, private, liberal arts, or other institution type), where peer institutions are defined as those institutions where median student scores fall within five percentiles of a student's own score.

Table Notes: The study also provided results for whether students submitted at least five applications, applied to a peer public university, applied to a peer private university, applied to a peer liberal arts college, applied/admitted/enrolled to an institution that was peer within a range of percentile points, 4-year graduation rates of colleges to which applied/admitted/enrolled, instructional spending of colleges to which applied/admitted/enrolled, student related spending of colleges to which applied/admitted/enrolled, median SAT scores of colleges to which applied/admitted/enrolled, filed a FAFSA, used any application fee waivers, and number of application fee waivers used. These outcomes were not included in this report because they were not eligible outcomes as specified in the protocol and/or were overlapping with the more comprehensive application and enrollment outcomes included in this report.

EMBARGOED UNTIL 10:00 AM ET, MARCH 11, 2014

Appendix C: Study findings for each domain

Domain and outcome measure	Study sample	Sample size	Mean (standard deviation)		WWC calculations			*p*-value
			Intervention group	Comparison group	Mean difference	Effect size	Improvement index	
Postsecondary applications								
Number of applications submitted	2011–12 cohort	1,835 students	5.56 (nr)	4.67 (3.60)	0.89	0.23	+9	< 0.01
Applied to a peer/ selective institution	2011–12 cohort	1,748 students	67%	55%	12%	0.25	+10	< 0.01
Number of colleges to which admitted	2011–12 cohort	1,835 students	2.31 (nr)	2.06 (1.37)	0.25	0.17	+7	< 0.01
Admitted to a peer/ selective institution	2011–12 cohort	1,738 students	39%	30%	9%	0.19	+8	< 0.01
Domain average for postsecondary applications						**0.21**	**+8**	**Statistically significant**
Postsecondary enrollment								
Enrolled in a peer/ selective institution	2011–12 cohort	1,687 students	34%	29%	5%	0.12	+4	< 0.05
Domain average for postsecondary enrollment						**0.12**	**+4**	**Statistically significant**

Table Notes: For mean difference, effect size, and improvement index values reported in the table, a positive number favors the intervention group and a negative number favors the comparison group. The effect size is a standardized measure of the effect of an intervention on student outcomes, representing the average change expected for all students who are given the intervention (measured in standard deviations of the outcome measure). The effect sizes reported here were computed by the WWC (using *t*-statistics from regression models reported in the original study) and therefore differ from the effect sizes reported in the original study, which estimated effect sizes using the standard deviation in the comparison group (rather than the pooled standard deviation, used in the WWC calculations). The improvement index is an alternate presentation of the effect size, reflecting the change in an average student's percentile rank that can be expected if the student is given the intervention. The WWC-computed average effect size is a simple average rounded to two decimal places; the average improvement index is calculated from the average effect size. The statistical significance of the study's domain average was determined by the WWC; the study is characterized as having a statistically significant positive effect because univariate statistical tests are reported for each outcome measure, the effect for at least one measure within the domain is positive and statistically significant, and no effects are negative and statistically significant, accounting for multiple comparisons. nr=not reported.

Study Notes: A correction for multiple comparisons was needed and resulted in a WWC-computed *p*-value of < 0.05 for the *Postsecondary Applications* domain; therefore, the WWC confirmed that the result in this domain was statistically significant. The *p*-values presented here were reported in the original study.

EMBARGOED UNTIL 10:00 AM ET, MARCH 11, 2014

Endnotes

[1] Single study reviews examine evidence published in a study (supplemented, if necessary, by information obtained directly from the author[s]) to assess whether the study design meets WWC evidence standards. The review reports the WWC's assessment of whether the study meets WWC evidence standards and summarizes the study findings following WWC conventions for reporting evidence on effectiveness. This study was reviewed using the Postsecondary Education topic area review protocol, version 2.0. A quick review of this study was released on April 17, 2013, and this report is the follow-up review that replaces that initial assessment. The WWC rating applies only to the results that were eligible under this topic area and met WWC standards with reservations, and not necessarily to all results presented in the study.

[2] There are no conflicts of interest to report.

[3] Students were randomly assigned to the multi-component (ECO-C) intervention program (n = 3,000) or a no-treatment comparison condition (n = 3,000), or to one of four other single component interventions (n = 12,000). These single component interventions included an *Application Guidance* intervention (n = 3,000), a *Net Cost* intervention (n = 3,000), a *Fee Waiver* intervention (n = 3,000), and a *Parent* intervention (n = 3,000). This review only focuses on the reported effects of the multi-component ECO-C intervention program, relative to the comparison condition, given that this multi-component intervention included three of the four components that were in each of these four single component interventions (the *Parent* intervention was dropped for the multi-component intervention program).

Recommended Citation

U.S. Department of Education, Institute of Education Sciences, What Works Clearinghouse. (2014, March). *WWC review of the report: Expanding college opportunities for high-achieving, low income students.* Retrieved from http://whatworks.ed.gov

EMBARGOED UNTIL 10:00 AM ET, MARCH 11, 2014

Glossary of Terms

Attrition Attrition occurs when an outcome variable is not available for all participants initially assigned to the intervention and comparison groups. The WWC considers the total attrition rate and the difference in attrition rates across groups within a study.

Clustering adjustment If intervention assignment is made at a cluster level and the analysis is conducted at the student level, the WWC will adjust the statistical significance to account for this mismatch, if necessary.

Confounding factor A confounding factor is a component of a study that is completely aligned with one of the study conditions, making it impossible to separate how much of the observed effect was due to the intervention and how much was due to the factor.

Design The design of a study is the method by which intervention and comparison groups were assigned.

Domain A domain is a group of closely related outcomes.

Effect size The effect size is a measure of the magnitude of an effect. The WWC uses a standardized measure to facilitate comparisons across studies and outcomes.

Eligibility A study is eligible for review if it falls within the scope of the review protocol and uses either an experimental or matched comparison group design.

Equivalence A demonstration that the analysis sample groups are similar on observed characteristics defined in the review area protocol.

Improvement index Along a percentile distribution of students, the improvement index represents the gain or loss of the average student due to the intervention. As the average student starts at the 50th percentile, the measure ranges from –50 to +50.

Multiple comparison adjustment When a study includes multiple outcomes or comparison groups, the WWC will adjust the statistical significance to account for the multiple comparisons, if necessary.

Quasi-experimental design (QED) A quasi-experimental design (QED) is a research design in which subjects are assigned to intervention and comparison groups through a process that is not random.

Randomized controlled trial (RCT) A randomized controlled trial (RCT) is an experiment in which investigators randomly assign eligible participants into intervention and comparison groups.

Single-case design (SCD) A research approach in which an outcome variable is measured repeatedly within and across different conditions that are defined by the presence or absence of an intervention.

Standard deviation The standard deviation of a measure shows how much variation exists across observations in the sample. A low standard deviation indicates that the observations in the sample tend to be very close to the mean; a high standard deviation indicates that the observations in the sample are spread out over a large range of values.

Statistical significance Statistical significance is the probability that the difference between groups is a result of chance rather than a real difference between the groups. The WWC labels a finding statistically significant if the likelihood that the difference is due to chance is less than 5% ($p < 0.05$).

Substantively important A substantively important finding is one that has an effect size of 0.25 or greater, regardless of statistical significance.

Please see the WWC Procedures and Standards Handbook (version 2.1) for additional details.

EMBARGOED UNTIL 10:00 AM ET, MARCH 11, 2014

What Works

From:What Works
Sent:10 Mar 2014 10:00:04 -0400
To:set5h@virginia.edu
Subject:WWC Review of Hoxby and Turner, 2013
Attachments:SSR20005_DC.pdf
Dear Dr. Turner:

We are emailing to inform you that a What Works Clearinghouse (WWC) single study review of your report, "Expanding college opportunities for high-achieving, low income students (2013)," will be posted on the WWC website tomorrow, 03/11/2014. As part of this process, we are sharing with you a courtesy copy of the review (attached as a PDF to this e-mail). **This single study review is embargoed until tomorrow, 03/11/2014, at 10am Eastern Time and cannot be circulated until that time.**

To learn more about WWC single study reviews, you can visit the WWC website at: http://ies.ed.gov/ncee/wwc/.

Because of the volume of correspondence the WWC receives, questions regarding WWC reports and single study reviews should be submitted to the Help Desk at info@whatworks.ed.gov. Your questions will be forwarded to the appropriate staff member on the WWC team and you will receive an e-mail response.

Sincerely,

The What Works Clearinghouse Team

Turner, Sarah (set5h)

From:Turner, Sarah (set5h)
Sent:10 Mar 2014 17:45:51 +0000
To:What Works
Cc:caroline hoxby (choxby@stanford.edu)
Subject:RE: WWC Review of Hoxby and Turner, 2013

To whom it may concern:

There is a serious problem in this review that must be addressed before release. The review notes: "Although students were randomized to the intervention and comparison conditions, there was a high level of non-response on the surveys used to collect post-intervention outcome measures. The study demonstrated baseline equivalence of the analysis samples for the outcomes presented in this WWC report." First, no where in the WWC report is there a discussion of the response rate or why this should be viewed as "a high level of non-response". The WWC comment is an assertion without documentation or justification.

More significantly, a primary outcome variable "Enrolled in a peer / selective institution" is also measured using the National Student Clearinghouse (NSC) administrative data which has a match rate close to 95%. Results using this alternative source are very similar to those reported using survey data as noted in the paper.

To release this WWC comment without acknowledging the NSC results and suggesting a problem with response rates when none exists is irresponsible. This problem needs to be corrected before any report is released.

What is more, signing an email like this without acknowledging individual responsibility (a person, now WWC) is unprofessional.

Thank you for your prompt attention to this matter.

Sarah Turner

Sarah E. Turner
University Professor
Economics and Education
University of Virginia
P.O. Box 400182
Monroe Hall
Charlottesville, VA 22903
phone: (434) 982-2383
email: sturner@virginia.edu

From: What Works [mailto:whatworks@mathematica-mpr.com]
Sent: Monday, March 10, 2014 10:00 AM
To: set5h@virginia.edu
Subject: WWC Review of Hoxby and Turner, 2013

Dear Dr. Turner:

We are emailing to inform you that a What Works Clearinghouse (WWC) single study review of your report, "Expanding college opportunities for high-achieving, low income students (2013)," will be posted on the WWC website tomorrow, 03/11/2014. As part of this process, we are sharing with you a courtesy copy of the review (attached as a PDF to this e-mail). **This single study review is embargoed until tomorrow, 03/11/2014, at 10am Eastern Time and cannot be circulated until that time.**

To learn more about WWC single study reviews, you can visit the WWC website at: http://ies.ed.gov/ncee/wwc/.

Because of the volume of correspondence the WWC receives, questions regarding WWC reports and single study reviews should be submitted to the Help Desk at info@whatworks.ed.gov. Your questions will be forwarded to the appropriate staff member on the WWC team and you will receive an e-mail response.

Sincerely,

The What Works Clearinghouse Team

Turner, Sarah (set5h)

From:Turner, Sarah (set5h)
Sent:10 Mar 2014 18:14:58 +0000
To:Ruth.Neild@ed.gov
Cc:caroline hoxby (choxby@stanford.edu);info@whatworks.ed.gov
Subject:RE: WWC Review of Hoxby and Turner, 2013

Dear Ruth:

I am traveling and have limited connectivity today but I am very concerned that this email response (below) to a WWC report will not be acted on by an individual as all "contacts" listed on the website are broad "info" accounts. My understanding is that your office at IES supervises the WWC process.

Given the large investment in this study and the substantial time cost associated with issuing corrections and retractions, it is of significant importance to make sure that the WWC review process accurately reflects the results with the National Student Clearinghouse data (95% match rate), the correspondence between NSC and survey data and the underlying strength of the Expanding College Opportunities survey data collection.

Thank you for your attention to this matter.
Sarah Turner

From: Turner, Sarah (set5h)
Sent: Monday, March 10, 2014 1:46 PM
To: 'What Works'
Cc: caroline hoxby (choxby@stanford.edu)
Subject: RE: WWC Review of Hoxby and Turner, 2013

To whom it may concern:

There is a serious problem in this review that must be addressed before release. The review notes: "Although students were randomized to the intervention and comparison conditions, there was a high level of non-response on the surveys used to collect post-intervention outcome measures. The study demonstrated baseline equivalence of the analysis samples for the outcomes presented in this WWC report." First, no where in the WWC report is there a discussion of the response rate or why this should be viewed as "a high level of non-response". The WWC comment is an assertion without documentation or justification.

More significantly, a primary outcome variable "Enrolled in a peer / selective institution" is also measured using the National Student Clearinghouse (NSC) administrative data which has a match rate close to 95%. Results using this alternative source are very similar to those reported using survey data as noted in the paper.

To release this WWC comment without acknowledging the NSC results and suggesting a problem with response rates when none exists is irresponsible. This problem needs to be corrected before any report is released.

What is more, signing an email like this without acknowledging individual responsibility (a person, not WWC) is unprofessional.

Thank you for your prompt attention to this matter.

Sarah Turner

Sarah E. Turner
University Professor
Economics and Education
University of Virginia
P.O. Box 400182
Monroe Hall
Charlottesville, VA 22903
phone: (434) 982-2383
email: sturner@virginia.edu

From: What Works [mailto:whatworks@mathematica-mpr.com]
Sent: Monday, March 10, 2014 10:00 AM
To: set5h@virginia.edu
Subject: WWC Review of Hoxby and Turner, 2013

Dear Dr. Turner:

We are emailing to inform you that a What Works Clearinghouse (WWC) single study review of your report, "Expanding college opportunities for high-achieving, low income students (2013)," will be posted on the WWC website tomorrow, 03/11/2014. As part of this process, we are sharing with you a courtesy copy of the review (attached as a PDF to this e-mail). **This single study review is embargoed until tomorrow, 03/11/2014, at 10am Eastern Time and cannot be circulated until that time.**

To learn more about WWC single study reviews, you can visit the WWC website at: http://ies.ed.gov/ncee/wwc/.

Because of the volume of correspondence the WWC receives, questions regarding WWC reports and single study reviews should be submitted to the Help Desk at info@whatworks.ed.gov. Your questions will be forwarded to the appropriate staff member on the WWC team and you will receive an e-mail response.

Sincerely,

The What Works Clearinghouse Team

Neild, Ruth

From:Neild, Ruth
Sent:10 Mar 2014 13:41:18 -0500
To:Turner, Sarah (set5h)
Cc:caroline hoxby (choxby@stanford.edu);What Works
Subject:RE: WWC Review of Hoxby and Turner, 2013
Sarah,

Thanks for your note. The What Works Clearinghouse is very responsive, and the PI has just alerted the IES program officer regarding your email. I'm sure the WWC will be back in touch with you this afternoon.

Ruth

From: Turner, Sarah (set5h) [mailto:Set5h@eservices.virginia.edu]
Sent: Monday, March 10, 2014 2:15 PM
To: Neild, Ruth
Cc: caroline hoxby (choxby@stanford.edu); WhatWorks-Forwarder
Subject: RE: WWC Review of Hoxby and Turner, 2013

Dear Ruth:

I am traveling and have limited connectivity today but I am very concerned that this email response (below) to a WWC report will not be acted on by an individual as all "contacts" listed on the website are broad "info" accounts. My understanding is that your office at IES supervises the WWC process.

Given the large investment in this study and the substantial time cost associated with issuing corrections and retractions, it is of significant importance to make sure that the WWC review process accurately reflects the results with the National Student Clearinghouse data (95% match rate), the correspondence between NSC and survey data and the underlying strength of the Expanding College Opportunities survey data collection.

Thank you for your attention to this matter.
Sarah Turner

From: Turner, Sarah (set5h)
Sent: Monday, March 10, 2014 1:46 PM
To: 'What Works'
Cc: caroline hoxby (choxby@stanford.edu)
Subject: RE: WWC Review of Hoxby and Turner, 2013

To whom it may concern:

There is a serious problem in this review that must be addressed before release. The review notes: "Although students were randomized to the intervention and comparison conditions,

there was a high level of non-response on the surveys used to collect post-intervention outcome measures. The study demonstrated baseline equivalence of the analysis samples for the outcomes presented in this WWC report." First, no where in the WWC report is there a discussion of the response rate or why this should be viewed as "a high level of non-response". The WWC comment is an assertion without documentation or justification.

More significantly, a primary outcome variable "Enrolled in a peer / selective institution" is also measured using the National Student Clearinghouse (NSC) administrative data which has a match rate close to 95%. Results using this alternative source are very similar to those reported using survey data as noted in the paper.

To release this WWC comment without acknowledging the NSC results and suggesting a problem with response rates when none exists is irresponsible. This problem needs to be corrected before any report is released.

What is more, signing an email like this without acknowledging individual responsibility (a person, not WWC) is unprofessional.

Thank you for your prompt attention to this matter.

Sarah Turner

Sarah E. Turner
University Professor
Economics and Education
University of Virginia
P.O. Box 400182
Monroe Hall
Charlottesville, VA 22903
phone: (434) 982-2383
email: sturner@virginia.edu

From: What Works [mailto:whatworks@mathematica-mpr.com]
Sent: Monday, March 10, 2014 10:00 AM
To: set5h@virginia.edu
Subject: WWC Review of Hoxby and Turner, 2013

Dear Dr. Turner:

We are emailing to inform you that a What Works Clearinghouse (WWC) single study review of your report, "Expanding college opportunities for high-achieving, low income students (2013)," will be posted on the WWC website tomorrow, 03/11/2014. As part of this process, we are sharing with you a courtesy copy of the review (attached as a PDF to this e-mail). **This single study review is embargoed until tomorrow, 03/11/2014, at 10am Eastern Time and cannot be circulated until that time.**

To learn more about WWC single study reviews, you can visit the WWC website at: http://ies.ed.gov/ncee/wwc/.

Because of the volume of correspondence the WWC receives, questions regarding WWC reports and single study reviews should be submitted to the Help Desk at info@whatworks.ed.gov. Your questions will be forwarded to the appropriate staff member on the WWC team and you will receive an e-mail response.

Sincerely,

The What Works Clearinghouse Team

Jill Constantine

From:Jill Constantine
Sent:10 Mar 2014 14:53:22 -0400
To:Turner, Sarah (set5h)
Cc:What Works
Subject:RE: WWC Review of Hoxby and Turner, 2013

Hi Sarah,

I got your email and voice mail. You did the right thing in your initial email to What Works. The email is the WWC Help desk and they will forward your email to the PI and the team that conducted the review. You should hear back with a response from the team. The correspondences are sent, tracked, and logged through the help desk.

Jill

Jill Constantine
Vice President, Director of Human Services Research
Mathematica Policy Research
P.O. Box 2393
Princeton, NJ 08543-2393
Phone: 609-716-4391
jconstantine@mathematica-mpr.com
www.mathematica-mpr.com
MathPolResearch
Facebook

From: Turner, Sarah (set5h) [mailto:Set5h@eservices.virginia.edu]
Sent: Monday, March 10, 2014 1:50 PM
To: Jill Constantine
Subject: FW: WWC Review of Hoxby and Turner, 2013

Dear Jill:

This is a huge problem that looks to me to represent some serious errors and misunderstandings on the part of whoever is "reviewing" this for MPR. It would be efficient for everyone to resolve the problem without turning this into a public debate.

I am NYC and have very limited time for this today so at least a delay would appear appropriate.

My mobile number is (b)(6)

Thanks

Sarah

From: Turner, Sarah (set5h)
Sent: Monday, March 10, 2014 1:46 PM
To: 'What Works'
Cc: caroline hoxby (choxby@stanford.edu)
Subject: RE: WWC Review of Hoxby and Turner, 2013

To whom it may concern:

There is a serious problem in this review that must be addressed before release. The review notes: "Although students were randomized to the intervention and comparison conditions, there was a high level of non-response on the surveys used to collect post-intervention outcome measures. The study demonstrated baseline equivalence of the analysis samples for the outcomes presented in this WWC report." First, no where in the WWC report is there a discussion of the response rate or why this should be viewed as "a high level of non-response". The WWC comment is an assertion without documentation or justification.

More significantly, a primary outcome variable "Enrolled in a peer / selective institution" is also measured using the National Student Clearinghouse (NSC) administrative data which has a match rate close to 95%. Results using this alternative source are very similar to those reported using survey data as noted in the paper.

To release this WWC comment without acknowledging the NSC results and suggesting a problem with response rates when none exists is irresponsible. This problem needs to be corrected before any report is released.

What is more, signing an email like this without acknowledging individual responsibility (a person, now WWC) is unprofessional.

Thank you for your prompt attention to this matter.

Sarah Turner

Sarah E. Turner
University Professor
Economics and Education
University of Virginia
P.O. Box 400182
Monroe Hall
Charlottesville, VA 22903

phone: (434) 982-2383
email: sturner@virginia.edu

From: What Works [mailto:whatworks@mathematica-mpr.com]
Sent: Monday, March 10, 2014 10:00 AM
To: set5h@virginia.edu
Subject: WWC Review of Hoxby and Turner, 2013

Dear Dr. Turner:

We are emailing to inform you that a What Works Clearinghouse (WWC) single study review of your report, "Expanding college opportunities for high-achieving, low income students (2013)," will be posted on the WWC website tomorrow, 03/11/2014. As part of this process, we are sharing with you a courtesy copy of the review (attached as a PDF to this e-mail). **This single study review is embargoed until tomorrow, 03/11/2014, at 10am Eastern Time and cannot be circulated until that time.**

To learn more about WWC single study reviews, you can visit the WWC website at: http://ies.ed.gov/ncee/wwc/.

Because of the volume of correspondence the WWC receives, questions regarding WWC reports and single study reviews should be submitted to the Help Desk at info@whatworks.ed.gov. Your questions will be forwarded to the appropriate staff member on the WWC team and you will receive an e-mail response.

Sincerely,

The What Works Clearinghouse Team

caroline hoxby

From:caroline hoxby
Sent:10 Mar 2014 12:10:45 -0700
To:Neild, Ruth
Cc:Turner, Sarah (set5h);What Works
Subject:Re: WWC Review of Hoxby and Turner, 2013

Dear Ruth,

I would like to "second" Sarah Turner's email. Given that all of our key outcomes are covered by the National Student Clearinghouse (with a 95% coverage rate) AND that we confirm that responders to our survey (which has an excellent response rate too, especially for a long and complex survey) were fully representative of the whole group of participants (checked against original data and the NSC data), the WWC report is completely unwarranted. Indeed, I have never thought that WWC did an excellent job, but this job demonstrates that WWC does not know its job at all well. If WWC spreads misinformation, having it in existence is worse than having it not exist.

I will plan to discuss this with leadership at the U.S. Department of Education when next I speak to them, as I not infrequently do.

Sincerely,

Caroline Hoxby

On Mon, Mar 10, 2014 at 11:41 AM, Neild, Ruth <Ruth.Neild@ed.gov> wrote:
> Sarah,
>
>
>
> Thanks for your note. The What Works Clearinghouse is very responsive, and
> the PI has just alerted the IES program officer regarding your email. I'm
> sure the WWC will be back in touch with you this afternoon.
>
>
>
> Ruth
>
>
>
> From: Turner, Sarah (set5h) [mailto:Set5h@eservices.virginia.edu]
> Sent: Monday, March 10, 2014 2:15 PM
> To: Neild, Ruth
> Cc: caroline hoxby (choxby@stanford.edu); WhatWorks-Forwarder
>
>
> Subject: RE: WWC Review of Hoxby and Turner, 2013
>
>
>
> Dear Ruth:

>
>
>
> I am traveling and have limited connectivity today but I am very concerned
> that this email response (below) to a WWC report will not be acted on by an
> individual as all "contacts" listed on the website are broad "info"
> accounts. My understanding is that your office at IES supervises the WWC
> process.
>
>
>
> Given the large investment in this study and the substantial time cost
> associated with issuing corrections and retractions, it is of significant
> importance to make sure that the WWC review process accurately reflects the
> results with the National Student Clearinghouse data (95% match rate), the
> correspondence between NSC and survey data and the underlying strength of
> the Expanding College Opportunities survey data collection.
>
>
>
> Thank you for your attention to this matter.
>
> Sarah Turner
>
>
>
>
>
> From: Turner, Sarah (set5h)
> Sent: Monday, March 10, 2014 1:46 PM
> To: 'What Works'
> Cc: caroline hoxby (choxby@stanford.edu)
> Subject: RE: WWC Review of Hoxby and Turner, 2013
>
>
>
>
>
> To whom it may concern:
>
>
>
> There is a serious problem in this review that must be addressed before
> release. The review notes: "Although students were randomized to the
> intervention and comparison conditions, there was a high level of
> non-response on the surveys used to collect post-intervention outcome
> measures. The study demonstrated baseline equivalence of the analysis
> samples for the outcomes presented in this WWC report." First, no where in
> the WWC report is there a discussion of the response rate or why this should
> be viewed as "a high level of non-response". The WWC comment is an
> assertion without documentation or justification.
>
>
>
> More significantly, a primary outcome variable "Enrolled in a peer /
> selective institution" is also measured using the National Student

> Clearinghouse (NSC) administrative data which has a match rate close to 95%.
> Results using this alternative source are very similar to those reported
> using survey data as noted in the paper.
>
>
>
> To release this WWC comment without acknowledging the NSC results and
> suggesting a problem with response rates when none exists is irresponsible.
> This problem needs to be corrected before any report is released.
>
>
>
> What is more, signing an email like this without acknowledging individual
> responsibility (a person, not WWC) is unprofessional.
>
>
>
> Thank you for your prompt attention to this matter.
>
>
>
> Sarah Turner
>
>
>
> Sarah E. Turner
>
> University Professor
>
> Economics and Education
>
> University of Virginia
>
> P.O. Box 400182
>
> Monroe Hall
>
> Charlottesville, VA 22903
>
> phone: (434) 982-2383
>
> email: sturner@virginia.edu
>
>
>
>
>
>
>
>
>
>
>
>
>

>
> From: What Works [mailto:whatworks@mathematica-mpr.com]
> Sent: Monday, March 10, 2014 10:00 AM
> To: set5h@virginia.edu
> Subject: WWC Review of Hoxby and Turner, 2013
>
>
>
> Dear Dr. Turner:
>
>
>
> We are emailing to inform you that a What Works Clearinghouse (WWC) single
> study review of your report, "Expanding college opportunities for
> high-achieving, low income students (2013)," will be posted on the WWC
> website tomorrow, 03/11/2014. As part of this process, we are sharing with
> you a courtesy copy of the review (attached as a PDF to this e-mail). This
> single study review is embargoed until tomorrow, 03/11/2014, at 10am Eastern
> Time and cannot be circulated until that time.
>
>
>
> To learn more about WWC single study reviews, you can visit the WWC website
> at: http://ies.ed.gov/ncee/wwc/.
>
>
>
> Because of the volume of correspondence the WWC receives, questions
> regarding WWC reports and single study reviews should be submitted to the
> Help Desk at info@whatworks.ed.gov. Your questions will be forwarded to the
> appropriate staff member on the WWC team and you will receive an e-mail
> response.
>
>
>
> Sincerely,
>
>
>
> The What Works Clearinghouse Team
>
>

--
Caroline M. Hoxby
Scott & Donya Bommer Professor of Economics
Senior Fellow of the Hoover Institution
Director, Economics of Education Program, National Bureau of Economic Research
Senior Fellow of the Stanford Institute for Economic Policy Research
choxby@stanford.edu
Assistant: Kelly Carson
650-723-9678, carson@stanford.edu
mailing address:
at the department of economics:

Department of Economics
Stanford University
Landau Building, 579 Serra Mall
Stanford CA 94305

Wilson, Sandra Jo

From:Wilson, Sandra Jo
Sent:17 Dec 2014 13:09:09 +0000
To:Cheryl Behany
Cc:jeff.valentine@louisville.edu;Neil Seftor;Scott Cody;Julia Lyskawa
Subject:FW: WWC Review of Hoxby and Turner, 2013
From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Monday, March 10, 2014 4:02 PM
To: choxby@stanford.edu; Set5h@eservices.virginia.edu
Subject: WWC Review of Hoxby and Turner, 2013

Dear Drs. Turner and Hoxby,

Thank you for contacting the What Works Clearinghouse (WWC).

We have received your email about the *Expanding College Opportunities* Single Study Review. The WWC team responsible for the report is reviewing your email and will prepare a written response. To help us better understand the information reported in your study, the WWC may request additional information from you. If the review concludes that the original review contained errors, a revised version of the review will be published on the web site. However, it is WWC policy that the existing report will be posted on schedule and remain on the web site, and be revised only if the WWC team determines it does contain errors. These reviews are one of tools used to ensure that the standards established by the Institute of Education Sciences (IES) are upheld on every review conducted by the What Works Clearinghouse.

Thank you,

What Works Clearinghouse

The What Works Clearinghouse was established by the U.S. Department of Education's Institute of Education Sciences to provide educators, policymakers, researchers, and the public with a central and trusted source of scientific evidence of what works in education. For more information, please visit http://ies.ed.gov/ncee/wwc/.

What Works Clearinghouse WWC

A central and trusted source of scientific evidence for what works in education.

March 24, 2014

Dear Drs. Turner and Hoxby,

Thank you for contacting the What Works Clearinghouse (WWC) about the *Expanding College Opportunities* single study review. We have reviewed your email inquiry. Below we summarize your concerns and provide a response that we hope provides some clarification regarding WWC standards for conducting single study reviews.

If we understand correctly, your concerns are that:

1. The single study review does not explain how the survey non-response observed in your study contributed to its rating.
2. The primary outcome variable of postsecondary enrollment was also measured using the NSC data, which had a match rate close to 95%, and is therefore similar to the ECO Survey data noted in the paper.

We hope the information below provides additional clarification to address your concerns:

1. All WWC reviews are governed by the WWC Procedures and Standards Handbook, which is available on the WWC's website (as indicated on p. 8 of the single study review, this particular review was conducted using Version 2.1). As outlined on pages 13-14 of the Handbook, both overall attrition and differential attrition are considered in the assignment of the study rating for randomized experiments. Based on the assigned (n = 6,000) and observed (n = 1,835) sample sizes reported for the ECO-C and Control groups, the study qualifies as having a high level of attrition according to the WWC standards. While we agree that there was essentially no difference in response rates across conditions, WWC standards require that *both* the overall and the differential attrition standards be met for a randomized experiment to meet standards without reservations.
2. We appreciate that you collected NSC administrative data that has a match rate close to 95% (as reported on page 18 of your study), and agree that this information has the potential to provide additional support for the results reported in your study. Nonetheless, the outcome data reported in the paper and summarized in the Single Study Review originated from the Expanding College Opportunities survey (as noted in the footnotes of Tables 1-5). Neither the paper

nor the online appendix provides outcome data for the ECO-C vs. Control conditions using the NSC data. Following the standards in the WWC Handbook, the amount of missing data must be assessed using the same data source that provided the post-intervention effect sizes.

Therefore, we continue to believe that the currently assigned rating is consistent with the WWC's Procedures and Standards Handbook, and the single study review will remain on the WWC's website without revision.

We hope this explanation has been helpful. Please let us know if you would like further clarification regarding the current WWC standards for single study reviews.

Sincerely,

What Works Clearinghouse

What Works

From:What Works
Sent:24 Mar 2014 13:12:20 +0000
To:'choxby@stanford.edu';'Set5h@eservices.virginia.edu'
Cc:'whatworks@dsgonline.com'
Subject:RE: WWC Review of Hoxby and Turner, 2013
Attachments:Issue 4608.Email 8.WWC to Requestor.pdf

Dear Drs. Turner and Hoxby,

Please see the attached document for a response to the questions you raised on March 10, 2014. Please let us know if you have additional questions.

Thank you,

What Works Clearinghouse

From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Monday, March 10, 2014 4:02 PM
To: choxby@stanford.edu; Set5h@eservices.virginia.edu
Subject: WWC Review of Hoxby and Turner, 2013

Dear Drs. Turner and Hoxby,

Thank you for contacting the What Works Clearinghouse (WWC).

We have received your email about the *Expanding College Opportunities* Single Study Review. The WWC team responsible for the report is reviewing your email and will prepare a written response. To help us better understand the information reported in your study, the WWC may request additional information from you. If the review concludes that the original review contained errors, a revised version of the review will be published on the web site. However, it is WWC policy that the existing report will be posted on schedule and remain on the web site, and be revised only if the WWC team determines it does contain errors. These reviews are one of tools used to ensure that the standards established by the Institute of Education Sciences (IES) are upheld on every review conducted by the What Works Clearinghouse.

Thank you,

What Works Clearinghouse

The What Works Clearinghouse was established by the U.S. Department of Education's Institute of Education Sciences to provide educators, policymakers, researchers, and the public with a central and trusted source of scientific evidence of what works in education. For more information, please visit http://ies.ed.gov/ncee/wwc/.

Turner, Sarah E. (set5h)

From:Turner, Sarah E. (set5h)
Sent:31 Mar 2014 01:33:58 +0000
To:What Works;choxby@stanford.edu
Cc:whatworks@dsgonline.com;Jill Constantine;Neild, Ruth
Subject:RE: WWC Review of Hoxby and Turner, 2013
Attachments:wwc_response.pdf

Dear Individuals Responsible for the WWC:

Please see the attached response to the WWC letter of March 24, which follows up on the concerns about the WWC review raised March 10.

Note that this set of iterations should have been avoided.

Sarah

From: What Works [mailto:whatworks@mathematica-mpr.com]
Sent: Monday, March 24, 2014 9:12 AM
To: choxby@stanford.edu; Turner, Sarah E. (set5h)
Cc: whatworks@dsgonline.com
Subject: RE: WWC Review of Hoxby and Turner, 2013

Dear Drs. Turner and Hoxby,

Please see the attached document for a response to the questions you raised on March 10, 2014. Please let us know if you have additional questions.

Thank you,

What Works Clearinghouse

From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Monday, March 10, 2014 4:02 PM
To: choxby@stanford.edu; Set5h@eservices.virginia.edu
Subject: WWC Review of Hoxby and Turner, 2013

Dear Drs. Turner and Hoxby,

Thank you for contacting the What Works Clearinghouse (WWC).

We have received your email about the *Expanding College Opportunities* Single Study Review. The WWC team responsible for the report is reviewing your email and will prepare a written response. To help us better understand the information reported in your study, the WWC may request additional information from you. If the review concludes that the original review contained errors, a revised version of the review will be published on the web site. However, it is

WWC policy that the existing report will be posted on schedule and remain on the web site, and be revised only if the WWC team determines it does contain errors. These reviews are one of tools used to ensure that the standards established by the Institute of Education Sciences (IES) are upheld on every review conducted by the What Works Clearinghouse.

Thank you,

What Works Clearinghouse

The What Works Clearinghouse was established by the U.S. Department of Education's Institute of Education Sciences to provide educators, policymakers, researchers, and the public with a central and trusted source of scientific evidence of what works in education. For more information, please visit http://ies.ed.gov/ncee/wwc/.

EXPANDING COLLEGE OPPORTUNITIES

March 30, 2014

Institute of Education Sciences
555 New Jersey Ave, NW
Room 504b
Washington, DC 20208-5500

Mathematica Policy Research
P.O. Box 2393
Princeton, NJ 08543-2393

Development Services Group, Inc.
7315 Wisconsin Ave # 800E
Bethesda, MD 20814-3255

Dear Individuals Responsible for the WWC:

We write to follow-up on what are serious failures of reading comprehension and process in the What Works Clearinghouse (WWC) review process with respect to our study "Expanding college opportunities for high-achieving, low income students" (2013). The WWC chose to disseminate its review with the description "this evidence meets WWC standards with reservations." This dissemination occurred despite our objection (on Monday March 10) that any conclusion that our response rate did not meet WWC standards was likely made in error.

The anonymous reviewers for WWC made fundamental errors in their calculation of the survey response rate and arrived at an erroneous conclusion. The reviewers failed to align their conclusion with the working paper or the Supplemental Tables (sent to Ms. Emily Tanner-Smith on October 18). In addition, the reviewers simply disregarded key information on data from the National Student Clearinghouse evidence which was referenced in the paper and appendix materials.

Let us begin by addressing the errors of the review:

1. *Survey response rate*: The WWC Single Study Review (WWC: 3/10) asserts that "there was a high level of non-response on the surveys used to collect post-intervention outcome measures." Yet, the WWC:3/10 does not reference a survey completion rate even as the paper notes an <u>overall</u> survey completion rate of (66.9% , p 18).[1]

What the WWC completely missed is the understanding of the appropriate numerator and denominator for calculating the survey response rate. Indeed, it is most disappointing that WWC

[1] Note that this survey completion rate reflects the completion rate for the target sample (59%) and the non-target samples of students from feeder schools and more affluent families with an a response rate of about 85%.

434 Galvez Mall, Mail Code 6010, Stanford, CA 94305-6010
phone: 650.725.0895 • fax: 650.204.6173 • email: college.opps@gmail.com

made this error as we went to particular efforts to provide WWC with additional counts and data requested for this review. Indeed, we were not able to identify the source of the WWC error until March 24 when, in response to our concern, WWC revealed that the basis for the conclusion is the ratio of 1835 to 6000, which reflects a profound misinterpretation of the data presented in our work.

First, as noted on p. 15 of the study, "we used a random number generator to randomly select 18,000 students. 12,000 of these were our target students …" Thus with 5 treatment arms, in addition to controls, we had 2000 names assigned to each arm of the treatment in the Target group. In turn (as noted on p. 16), 6000 names were selected who met the test score criteria but were either above the first tertile in income and / or attended a feeder school; these individuals are in the Non-Target group.

Secondly, as noted on p. 20, a number of students moved between the time of registering for the exam and the delivery of treatment materials. As we note "households that do not receive any materials are clearly untreated by the interventions, and in a typical research design they would not even be recorded as participants who we intended to treat since they could not possibly have been treated." Absence of good contact information or missing key geographic variables reduced the number of cases available to survey and the effective size of our treatment and control groups. The result is the following treatment and control numbers for the "Target" sample:[2]

Target Sample – Supplemental Table A1, Part A

Control:	obs=1536
ECO-C Treatment:	obs=1569
Total target treatment & control	obs=3105

To calculate the response rate, simply examine Supplemental Table A1, Part C which presents the counts and predetermined variable means for survey respondents:

Survey Respondents, Target Sample – Supp. Table A1, Part C

Control:	obs=917
ECO-C Treatment:	obs=918
Total target survey respondents	obs=1835

For the Target sample, we then have a response rate of 59%. Following similar procedures with the Non-target subsamples in Supp. Table A2, Parts A & C produces survey response rates of 84% and 85% for the students from feeder schools and more affluent families.

Thus, it is clearly an error to divide 1835 by 6000. Surely this type of egregious mistake should have been caught by the WWC administrative process!

[2] In Table A2, we also report counts for the non-target groups which include "feeder" and "affluent" subsets, which are not mutually exclusive.

434 Galvez Mall, Mail Code 6010, Stanford, CA 94305-6010
phone: 650.725.0895 • fax: 650.204.6173 • email: college.opps@gmail.com

It should be unambiguous that using WWC standards that, with a non-response or attrition rate of 41% for the Target sample and little differential attrition, the study should meet WWC standards without reservation.

2. *National Student Clearinghouse (NSC) administrative match*: Given the presence of data on means in the Supplemental Tables series from the NSC match in all of the "B Panel" Supplemental Tables, we are perplexed that the WWC refuses to recognize this source in the review. We stated clearly in the text (p. 26) that "we obtain very similar results if we use NSC data on the college in which students enroll first after high school graduation or enroll the longest after high school graduation." Surely, it is understandable that, with the paper already over 50 pages that we chose not to burden the text with additional results. Of course, WWC need only have asked for additional results if they were needed for its review process.

We expect that WWC will take prompt action to issue a revision of its rating to remove the "reservation" in the review given the clear mistake in calculating the survey completion rate.

Beyond the specific substantive errors, the response of WWC to our concerns is irresponsible. To hide behind anonymity and bureaucratic process when the credibility of millions of dollars in research investment and individual reputations are at stake is damaging to the credibility of WWC, IES and contract organizations like MPR. The current practices of WWC and its contractors are actually causing harm, not improving the quality of the evidentiary base. Individuals with appropriate research qualifications – not contractors hiding behind anonymous email addresses – need to assume responsibility for the integrity of the reviews issued by WWC.

We hope that you will be back in touch soon to resolve these problems.

Sincerely,

(b)(6)

Caroline M. Hoxby
choxby@stanford.edu
Scott and Donyer Bommer Professor of
Economics, Stanford University
Principal Investigator,
Expanding College Opportunities

(b)(6)

Sarah E. Turner
University Professor of Economics &
Education, University of Virginia
Principal Investigator,
Expanding College Opportunities

WhatWorks

From:WhatWorks
Sent:31 Mar 2014 22:28:53 +0000
To:'Set5h@eservices.virginia.edu'
Cc:'choxby@stanford.edu'
Subject:RE: WWC Review of Hoxby and Turner, 2013
Hello,

Thank you for contacting the What Works Clearinghouse (WWC). We have received your email below. WWC staff are reviewing your request and will prepare a response.

What Works Clearinghouse

The What Works Clearinghouse was established by the U.S. Department of Education's Institute of Education Sciences to provide educators, policymakers, researchers, and the public with a central and trusted source of scientific evidence of what works in education. For more information, please visit http://ies.ed.gov/ncee/wwc/.

From: Turner, Sarah E. (set5h) [mailto:Set5h@eservices.virginia.edu]
Sent: Sunday, March 30, 2014 8:34 PM
To: What Works; choxby@stanford.edu
Cc: whatworks@dsgonline.com; Jill Constantine; Neild, Ruth
Subject: RE: WWC Review of Hoxby and Turner, 2013

Dear Individuals Responsible for the WWC:

Please see the attached response to the WWC letter of March 24, which follows up on the concerns about the WWC review raised March 10.

Note that this set of iterations should have been avoided.

Sarah

From: What Works [mailto:whatworks@mathematica-mpr.com]
Sent: Monday, March 24, 2014 9:12 AM
To: choxby@stanford.edu; Turner, Sarah E. (set5h)
Cc: whatworks@dsgonline.com
Subject: RE: WWC Review of Hoxby and Turner, 2013

Dear Drs. Turner and Hoxby,

Please see the attached document for a response to the questions you raised on March 10, 2014. Please let us know if you have additional questions.

Thank you,

What Works Clearinghouse

From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Monday, March 10, 2014 4:02 PM
To: choxby@stanford.edu; Set5h@eservices.virginia.edu
Subject: WWC Review of Hoxby and Turner, 2013

Dear Drs. Turner and Hoxby,

Thank you for contacting the What Works Clearinghouse (WWC).

We have received your email about the *Expanding College Opportunities* Single Study Review. The WWC team responsible for the report is reviewing your email and will prepare a written response. To help us better understand the information reported in your study, the WWC may request additional information from you. If the review concludes that the original review contained errors, a revised version of the review will be published on the web site. However, it is WWC policy that the existing report will be posted on schedule and remain on the web site, and be revised only if the WWC team determines it does contain errors. These reviews are one of tools used to ensure that the standards established by the Institute of Education Sciences (IES) are upheld on every review conducted by the What Works Clearinghouse.

Thank you,

What Works Clearinghouse

The What Works Clearinghouse was established by the U.S. Department of Education's Institute of Education Sciences to provide educators, policymakers, researchers, and the public with a central and trusted source of scientific evidence of what works in education. For more information, please visit http://ies.ed.gov/ncee/wwc/.

What Works Clearinghouse WWC

A central and trusted source of scientific evidence for what works in education.

May 13, 2014

Dear Dr. Hoxby and Dr. Turner:

The What Works Clearinghouse (WWC) is currently conducting an independent Quality Review Team (QRT) review in response to your letter to the Help Desk on March 30, 2014 about the WWC's review of *Expanding College Opportunities for High Achieving, Low Income Students.* In the course of the QRT review, reviewers have identified three areas for which additional information is needed to better understand the data in your study:

1. Please verify that the number of students in the target sample who were initially assigned was (exactly) 2,000 for the ECO-C group and for the Control group.

2. Please provide the number of "returned-to-sender" mailings received from target sample members initially assigned to the ECO-C and Control groups, respectively.

3. Please complete the table below for the NSC analysis to be included in the review. *While the study mentions the NSC results on page 26 ("we find that we obtain very similar results if we use the NSC data"), none of the quantitative NSC findings are presented in the article or in author correspondence, and the QRT was unable to locate Online Appendix Table 3.*

Outcome Data Requested for WWC Review of *Expanding College Opportunities for High Achieving, Low Income Students*

	ECO-C Sample Size	Control Sample Size	**Effect in native units (std error)**	**Effect in percentage change**	**Effect size**	**p-value**
Enrolled in a peer/selective institution						

Note: The bold column headings align with the information presented in Table 5 (ITT effects of the ECO-C intervention on enrollment outcomes). We have also requested sample sizes contributing NSC data for each group for the purposes of attrition calculations.

If possible, we would like to receive this information by **5/20/2014**. Please contact us if this is not feasible. Otherwise, if we do not receive a response by **5/20/2014**, we will proceed based on the information in the paper.

Please email your response to info@whatworks.ed.gov.

Thank you very much for your help.

Sincerely,

(b)(6)

Jeff Valentine, PhD
Principal Investigator, What Works Clearinghouse at Development Services Group, Inc.
Associate Professor, University of Louisville
Educational Psychology, Measurement, and Evaluation

whatworks@dsgonline.com

From:whatworks@dsgonline.com
Sent:13 May 2014 12:52:29 +0000
To:choxby@stanford.edu;Set5h@eservices.virginia.edu
Cc:What Works
Subject:WWC Review of "Expanding College Opportunities"
Attachments:SSR_Hoxby_Turner_AQ_2.pdf

Dear Dr. Hoxby and Dr. Turner,

Attached is a letter outlining additional information that is needed regarding the "Expanding College Opportunities" study. Please let us know if you have questions.

Take care,

Jeff Valentine

Turner, Sarah E. (set5h)

From:Turner, Sarah E. (set5h)
Sent:27 May 2014 14:50:15 +0000
To:whatworks@dsgonline.com;choxby@stanford.edu
Cc:What Works
Subject:RE: WWC Review of "Expanding College Opportunities"

Dear Jeff:

Thanks for writing. As you might imagine, the last several weeks involve finals and graduation exercises at the University of Virginia.

As you surely know, it took 6 weeks to generate a response from WWC to my detailed letter of March 30. Thus, it is unreasonable that your correspondence would request a turnaround of mere 7 days during one of the absolutely busiest periods of the academic year.

A deadline of July 15 would be appropriate for the generation of the additional tabulations you request.

Good wishes,

Sarah

Sarah E. Turner
University Professor
Economics and Education
University of Virginia
P.O. Box 400182
Monroe Hall
Charlottesville, VA 22903
phone: (434) 982-2383
email: sturner@virginia.edu

From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Tuesday, May 13, 2014 8:52 AM
To: choxby@stanford.edu; Turner, Sarah E. (set5h)
Cc: whatworks@mathematica-mpr.com
Subject: WWC Review of "Expanding College Opportunities"

Dear Dr. Hoxby and Dr. Turner,

Attached is a letter outlining additional information that is needed regarding the "Expanding College Opportunities" study. Please let us know if you have questions.

Take care,

Jeff Valentine

whatworks@dsgonline.com

From:whatworks@dsgonline.com
Sent:30 May 2014 13:53:58 +0000
To:Turner, Sarah E. (set5h);choxby@stanford.edu
Cc:What Works;jeff.valentine@louisville.edu
Subject:RE: WWC Review of "Expanding College Opportunities"
Dear Sarah,
Thanks for getting back to us. We'll look forward to hearing from you on July 15.
Jeff

From: Turner, Sarah E. (set5h) [Set5h@eservices.virginia.edu]
Sent: Tuesday, May 27, 2014 10:50 AM
To: whatworks@dsgonline.com; choxby@stanford.edu
Cc: whatworks@mathematica-mpr.com
Subject: RE: WWC Review of "Expanding College Opportunities"

Dear Jeff:

Thanks for writing. As you might imagine, the last several weeks involve finals and graduation exercises at the University of Virginia.

As you surely know, it took 6 weeks to generate a response from WWC to my detailed letter of March 30. Thus, it is unreasonable that your correspondence would request a turnaround of mere 7 days during one of the absolutely busiest periods of the academic year.

A deadline of July 15 would be appropriate for the generation of the additional tabulations you request.

Good wishes,

Sarah

Sarah E. Turner
University Professor
Economics and Education
University of Virginia
P.O. Box 400182
Monroe Hall
Charlottesville, VA 22903
phone: (434) 982-2383
email: sturner@virginia.edu

From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Tuesday, May 13, 2014 8:52 AM
To: choxby@stanford.edu; Turner, Sarah E. (set5h)
Cc: whatworks@mathematica-mpr.com
Subject: WWC Review of "Expanding College Opportunities"

Dear Dr. Hoxby and Dr. Turner,

Attached is a letter outlining additional information that is needed regarding the "Expanding College Opportunities" study. Please let us know if you have questions.

Take care,

Jeff Valentine

Turner, Sarah E. (set5h)

From:Turner, Sarah E. (set5h)
Sent:27 Jul 2014 16:06:07 +0000
To:whatworks@dsgonline.com;choxby@stanford.edu
Cc:What Works;jeff.valentine@louisville.edu
Subject:RE: WWC Review of "Expanding College Opportunities"
Dear Jeff:

I wanted to write back – albeit with a bit of an unanticipated delay. My apologies.

We have just updated our National Student Clearinghouse merge and we would like to share with your team the results that include administrative college enrollment outcomes not just after fall year 1 enrollment but also year 2 enrollment. It is going to take until early August to get you this version of the full tables but they are "coming soon." It will certainly be most efficient to review the full updated version of the paper.

Thanks for your patience

Sarah

From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Friday, May 30, 2014 9:54 AM
To: Turner, Sarah E. (set5h); choxby@stanford.edu
Cc: whatworks@mathematica-mpr.com; jeff.valentine@louisville.edu
Subject: RE: WWC Review of "Expanding College Opportunities"

Dear Sarah,
Thanks for getting back to us. We'll look forward to hearing from you on July 15.
Jeff

From: Turner, Sarah E. (set5h) [Set5h@eservices.virginia.edu]
Sent: Tuesday, May 27, 2014 10:50 AM
To: whatworks@dsgonline.com; choxby@stanford.edu
Cc: whatworks@mathematica-mpr.com
Subject: RE: WWC Review of "Expanding College Opportunities"

Dear Jeff:

Thanks for writing. As you might imagine, the last several weeks involve finals and graduation exercises at the University of Virginia.

As you surely know, it took 6 weeks to generate a response from WWC to my detailed letter of March 30. Thus, it is unreasonable that your correspondence would request a turnaround of mere 7 days during one of the absolutely busiest periods of the academic year.

A deadline of July 15 would be appropriate for the generation of the additional tabulations you request.

Good wishes,

Sarah

Sarah E. Turner
University Professor
Economics and Education
University of Virginia
P.O. Box 400182
Monroe Hall
Charlottesville, VA 22903
phone: (434) 982-2383
email: sturner@virginia.edu

From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Tuesday, May 13, 2014 8:52 AM
To: choxby@stanford.edu; Turner, Sarah E. (set5h)
Cc: whatworks@mathematica-mpr.com
Subject: WWC Review of "Expanding College Opportunities"

Dear Dr. Hoxby and Dr. Turner,

Attached is a letter outlining additional information that is needed regarding the "Expanding College Opportunities" study. Please let us know if you have questions.

Take care,

Jeff Valentine

Valentine,Jeffrey C

From:Valentine,Jeffrey C
Sent:29 Jul 2014 13:52:39 +0000
To:Turner, Sarah E. (set5h);whatworks@dsgonline.com;choxby@stanford.edu
Cc:What Works
Subject:RE: WWC Review of "Expanding College Opportunities"
Hi Sarah, thanks for the note. I understand about the time intensive nature of working with NSC data!

Take care,

Jeff

From: Turner, Sarah E. (set5h) [Set5h@eservices.virginia.edu]
Sent: Sunday, July 27, 2014 12:06 PM
To: whatworks@dsgonline.com; choxby@stanford.edu
Cc: whatworks@mathematica-mpr.com; Valentine,Jeffrey C
Subject: RE: WWC Review of "Expanding College Opportunities"

Dear Jeff:

I wanted to write back – albeit with a bit of an unanticipated delay. My apologies.

We have just updated our National Student Clearinghouse merge and we would like to share with your team the results that include administrative college enrollment outcomes not just after fall year 1 enrollment but also year 2 enrollment. It is going to take until early August to get you this version of the full tables but they are "coming soon." It will certainly be most efficient to review the full updated version of the paper.

Thanks for your patience

Sarah

From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Friday, May 30, 2014 9:54 AM
To: Turner, Sarah E. (set5h); choxby@stanford.edu
Cc: whatworks@mathematica-mpr.com; jeff.valentine@louisville.edu
Subject: RE: WWC Review of "Expanding College Opportunities"

Dear Sarah,
Thanks for getting back to us. We'll look forward to hearing from you on July 15.
Jeff

From: Turner, Sarah E. (set5h) [Set5h@eservices.virginia.edu]
Sent: Tuesday, May 27, 2014 10:50 AM
To: whatworks@dsgonline.com; choxby@stanford.edu
Cc: whatworks@mathematica-mpr.com
Subject: RE: WWC Review of "Expanding College Opportunities"

Dear Jeff:

Thanks for writing. As you might imagine, the last several weeks involve finals and graduation exercises at the University of Virginia.

As you surely know, it took 6 weeks to generate a response from WWC to my detailed letter of March 30. Thus, it is unreasonable that your correspondence would request a turnaround of mere 7 days during one of the absolutely busiest periods of the academic year.

A deadline of July 15 would be appropriate for the generation of the additional tabulations you request.

Good wishes,

Sarah

Sarah E. Turner
University Professor
Economics and Education
University of Virginia
P.O. Box 400182
Monroe Hall
Charlottesville, VA 22903
phone: (434) 982-2383
email: sturner@virginia.edu

From: whatworks@dsgonline.com [mailto:whatworks@dsgonline.com]
Sent: Tuesday, May 13, 2014 8:52 AM
To: choxby@stanford.edu; Turner, Sarah E. (set5h)
Cc: whatworks@mathematica-mpr.com
Subject: WWC Review of "Expanding College Opportunities"

Dear Dr. Hoxby and Dr. Turner,

Attached is a letter outlining additional information that is needed regarding the "Expanding College Opportunities" study. Please let us know if you have questions.

Take care,

Jeff Valentine