# Two Dollar Challenge: Begin to Learn How the Other Half Lives 

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#### Abstract

The Two Dollar Challenge is an experiential learning exercise in which students live on two dollars a day and adhere to other rules that limit their access to water, clothing, and other preexisting sources of wealth. Each year we choose a poverty-related cause (for example, microfinance) and a non-governmental organization whose development program addresses our chosen cause as a partner. Participants seek out sponsors who donate funds to our partner for each day they live on $\$ 2$. The Two Dollar Challenge provides students a momentary and admittedly incomplete approximation of how nearly half the world's population lives; however, it does raise awareness of global poverty, inspire critical reflection, engender empathy, and provide participants with an opportunity to act.


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Nearly half the world's population lives on less than two dollars a day. ${ }^{1}$ According to the World Bank, in Sub-Saharan Africa and South Asia, the share of the population living below $\$ 2$ a day is $72.9 \%$ and $73.9 \%$, respectively. In Latin America and the Caribbean and the Middle East and North Africa it is $17.1 \%$ and $16.9 \%$ respectively. ${ }^{1}$ Poverty includes homelessness, malnutrition, lack of sanitation, and inadequate access to safe drinking water. Poverty's physical consequences include fatigue, susceptibility to disease and early death. Moreover, the daily struggle of the poor to secure the basic needs of warmth, water, food and shelter makes it difficult, indeed makes it risky, to plan for the future. The emotional distress, depression, and anxiety that attend poverty can lead the poor to believe that they are incapable of making a difference in their own lives. The poor are socially excluded, politically powerless, and vulnerable to crime, corruption, and coercion. They have limited access to education, technology, and markets. Overall they are marginalized, with few if any, economic opportunities to improve their standard of living. For these reasons, poverty has been likened to a trap (Smith 2005). Explaining the aforementioned pattern of poverty and grasping a better understanding of the daily existence of the poor is the fundamental purpose of a course focused on global poverty and economic development.

It is one thing to learn about the multiple dimensions of poverty by carefully following abstract lines of reasoning in a classroom. It is something entirely different to begin learning how the other half lives with the assistance of personal experience. Toward accomplishing this end, we invite our students to take on the Two Dollar Challenge (hereafter, Challenge); that is, live on two dollars a day for five days and four nights. Students also adhere to a number of additional rules which place constraints on their accustomed livelihoods. All are structured to

[^0]offer students a momentary and admittedly incomplete glimpse into a poor individual's daily struggle to meet their basic needs.

Beyond asking participants to briefly step into the context of the poor, the Challenge gives them an opportunity to be part of the solution. Each year we choose a poverty-related cause (for example, health, malnutrition, microfinance) and a non-governmental organization whose development programs address our chosen cause as a partner. In the weeks leading up to the Two Dollar Challenge, we spend classroom time reviewing the chosen cause and investigating the theoretical justification and empirical evidence that links our non-profit partner's development program to the alleviation of poverty. Outside of class, participants raise community awareness and seek out sponsors who donate money to the Challenge. Upon completion of the Challenge, all donations are transferred to our partner. Through our non-profit partners we are able to relax, however minutely, one of the many constraints that the poor confront. While participants can never experience what is like to live in poverty, we hope to accomplish four goals through this experience: provide participants with an opportunity and motivation to act, engender empathy, inspire critical reflection, and raise awareness of global poverty.

Some have argued that graduates of our higher education system cannot consider themselves educated if they do not have an understanding of how the other half of the world's population lives. ${ }^{2}$ The Two Dollar Challenge attempts to do just that. It has numerous imperfections. However, given the set of tools with which to accomplish that objective lectures, movies, readings, quotes from the poor - it is the least imperfect. Moreover, it allows participants to be part of the process of economic development through raising awareness and funds for their chosen non-profit partner and its development programs.

[^1]
## TWO DOLLAR CHALLENGE: DESIGN

The Two Dollar Challenge can be integrated into a number of economics courses (Appendix:
Assignment). Since the fall of 2006, we have had the opportunity to run the Two Dollar Challenge in our Principles of Macroeconomics, Comparative Economics, and Economic Development courses. We run it as an extra credit assignment (Appendix: Extra Credit). There are three fundamental steps:

## Step 1: Choose a Cause

As we mentioned in the introduction, poverty manifests itself in many forms. Consequently, when it comes to choosing a cause that you and your class can rally around, the list is unfortunately lengthy - education, microfinance, water, HIV Aids, human rights, and environmental justice to name just a few. Over the years, our chosen cause has been microfinance. ${ }^{3}$

Step 2: Choose a Partner

The next step is to select a non-profit partner that implements development programs that addresses your chosen cause. As we mentioned above, our chosen cause has been

[^2]microfinance. Our non-profit partners have included: Kiva, La Ceiba: MFI, and Opportunity International.

Step 3: Take the Two Dollar Challenge

For five days and four nights, participants constrain their daily income to two dollars. These four nights can be spent in makeshift shelters. Participants also limit their access to water, clothing, other preexisting sources of wealth, and set a monetary goal for fundraising. Participants can take the challenge and donate the difference between what they would have spent and their $\$ 2 \mathrm{a}$ day income. They can also seek out sponsors and have them tie their donation to each day that they successfully live on $\$ 2$ a day. Donors can also sponsor participants with a block donation.

In the following sub-sections, we will detail the various aspects of the Two Dollar Challenge, including the rules, code of conduct, and shelters on campus.

## Rules

Students participating in the Two Dollar Challenge are asked to adhere to the established rules for the duration of the Challenge (see Appendix: Rules). Of course, the fundamental rule is that students constrain their daily income to an average of two dollars a day. However, the rules permit the students to utilize a number of strategies while operating under the two dollar a day income constraint. For instance, some plan their meals for the duration of the Challenge and go to the grocery store with all five days worth of income to purchase their desired goods. Others will take the Challenge one day at a time and spend their income only when they feel like they
need to. While still others will form into groups, pool together their resources, and coordinate their purchase of group goods. Students in these groups have specialized in the purchase of particular items - for example, the bulk purchase of rice and beans and the purchase of hygiene related items such as tooth paste and deodorant. Students in these groups have also specialized in boiling water, begging, raising funds for our non-profit partner and gathering the building materials for the shelters. Indeed, participants develop a small economy through the trading of goods and services with each other and non-participants.

Some of the more salient rules constraining participants include having to boil water before it can be consumed. Showers are not permitted. Participants can bathe from a public water source (for example, from a sink in a common area); however, hot water is not permitted unless personally heated. The consumption of electricity is regulated by nature. Lights can come on when the sun rises but have to go out when it sets. For any work to be completed after sunset, participants have to go to a common area to access electricity. Only two complete outfits of clothing are allowed and they must be kept on your possession at all times. Participants are also expected to attend two discussion nights to be held at the shelters (see below).

We have a number of exemptions designed into the simulation to maintain the safety of participants - including access to refrigeration for perishable items and a stove top with appropriate pans for boiling water. Health related goods and services are allowed into the simulation. Recognizing the fact that some participants are also parents, dependent family members are exempt from the rules. However, some parents have found that involving family members to some degree, whether full participation or limiting luxuries such as cell phone use, furthered the educational experience. Moreover, the consumption of gasoline is exempt for students who commute or have jobs and/or internships that they drive to. Students are also
allowed to bring in their uniforms for work or athletic teams. Finally, students have continued access to housing without constraint. Some may conclude that having students in the United States live off a $\$ 2$ per person per day is overly harsh (Appendix: Purchasing Power Parity). However, given their continued access to the aforementioned forms of wealth and food donations from non-participants (see discussion below), participants are not living off a $\$ 2$ per day. Indeed, for the most part, participants spend their income on food and some toiletries only. The two dollar per person/per day constraint is purely symbolic.

## Code of Conduct

In addition to the rules, we also have a code-of-conduct which we review with the students and ask them to sign before taking the Challenge (see Appendix: Code of Conduct). One obvious rule is that participants are not allowed to relax their income constraint through stealing. They are allowed to request assistance from others in the community - for example, begging for food. However, they must ask for assistance from individuals other than their friends and family. Moreover, they must request assistance first and explain the exercise they are engaged in second. The sequence of actions is crucial for two reasons. By requesting assistance first, participants have an opportunity to experience the humbling process of asking for assistance from others. Explaining the exercise they are engaged in next provides participants with an opportunity to spread awareness of global poverty. It also provides those individuals from which they begged an opportunity to rescind their assistance. These individuals may feel those resource would be better dedicated for those in the local community who are truly in need.

Participants will most likely have non-participants approach them and offer to donate food, drinks, and even articles of clothing. While donations ease the self-imposed income constraint participants are operating under, we have decided to allow participants to accept them for two reasons. Accepting donations facilitates interaction between participants and nonparticipating community members. These interactions provide a valuable opportunity to raise awareness and understanding. The donations are also a stark reminder to participants about the wealth of resources in their community. We leave it up to each participant to decide whether or not to consume perishable food donations. However, donations of non-perishable food and drink and other items are stored for the duration of the Challenge and delivered to the local homeless shelter upon its conclusion.

Arriving at the decision to accept donations was a struggle; however, it was a valuable exercise. It compelled us (the authors and our students) to honestly debate the purpose of this experiential-learning exercise. Upon first thought, one could reasonably conclude that accepting donations undermines the whole purpose of the exercise. The Two Dollar Challenge, however, is a personal journey for participants. It is a journey of contrasts between their daily life within and outside the exercise. Outside the Challenge their days are characterized by ease, fluidity and predictability. They wake up in the morning and the air in their room feels comfortable regardless of the time of year. With an adjustment of the thermostat, it is cooled and conditioned in the summer and warmed in the winter. Whatever their wake-up time, once out of bed, they can flip a switch and enjoy a lighted path to the bathroom. An effortless twist of a handle allows them to enjoy clean water for whatever purpose they intend. By twisting the handle marked with an "H" their water is not only clean but is heated. Preparing their breakfast is just as simple. It may require pushing a button. Similarly, their clothes are washed and dried with minimal effort.

Ready for the day, they tuck away their lap-top, cell-phone, digital music player, and any and all other things used in the process of accumulating knowledge into their backpack. The local barista prepares their caffeine vehicle of choice in exchange for that little piece of plastic in their wallet, pocket, or purse. Indeed, whenever they pass that little piece of plastic across any counter, other people, who for the most part are strangers, in exchange for its momentary possession, give them whatever they desire at that moment: a latte, a burrito, a slice of pizza, music, books, the list is endless.

Their days within the Challenge are more difficult, disrupted, and unpredictable. Participants find themselves spending an unusual amount of time being cautious, planning and strategizing. That includes the time spent walking up and down the aisles of a grocery stores deciding on what to get, moving back and forth between stores gathering price information, possibly brainstorming on how best to construct shelters in an effort protect themselves against the elements, and/or boiling water. There are innumerable moments throughout the Challenge when participants crave the luxury of clean drinking water with the twist of the faucet, instant illumination at the flip of a switch, or a cup of coffee that will break their $\$ 10$ budget. In those moments, they must decide whether to adhere, bend or break a rule. How far each participant wants to take the experience is a personal decision. Whatever their decision, these are indelible moments for participants. In these moments they recognize that they have a choice. They are choosing to "play" poverty and in some cases they may not do a very good job at it. Moreover, they have an exit at the end of the Challenge. For nearly half the world's population there is no choice to adhere, bend or break a rule to fulfill a desire. There is no immediate exit. The Two Dollar Challenge places participants in these moments for a moment through the contrast that it creates. The Challenge is not about strict adherence to the rules. Indeed, it should not be .

## Shelters

In addition to living on $\$ 2$ a day, a number of participants including one of us (Humphrey) choose to reside in shelters on campus. This aspect of the exercise is fully optional. Participants can choose to stay all four nights in the shelters, one or two nights, or move back and forth from the shelters and their dorm rooms as they see fit. The shelters serve as a place for participants to store non-perishable food and clothing. Indeed, a number of participants spend most if not all of their free time between classes and other activities at the shelters.

The chosen location and layout of the shelters are important factors to consider. We have chosen to construct shelters in the heart of campus. This not only draws awareness it also facilitates fundraising. We also do our best to position our shelters and accompanying sitting area in a way that is most inviting for non-participating students, administrators, faculty members and campus visitors to approach us and inquire about the exercise. As was mentioned earlier, on a number of occasions community members will drop off food, drinks, and other items. Making their approach easier is another reason to accept donations. Indeed, some of the most rewarding moments of this exercise occur when non-participating students approach us with donations and/or questions and subsequently ask to join us in the exercise. These have included students who are enrolled in one of our courses but earlier decided against participating and students who are not enrolled in the course.

Participants choosing to stay one or more nights in the shelters are permitted to bring additional wealth into the exercise - including tarps and sleeping bags. On the Mary Washington campus we use cardboard collected from behind the local grocery store, stakes, rope and various
other items collected from campus dumpsters to construct our shelters. Over the years, the shelters have evolved from a simple lean-to to one large communal structure. Participants on other campuses have chosen to build individual structures; however, having one large communal structure is advantageous for a number of reasons. First and foremost if creates a sense of community among the participants. Together we build and take down a shared space. In this shared space we hold our two "dinner and discussion" nights. On the first "dinner and discussion" night, we come together to share our resources for a communal dinner and discuss a chosen reading. ${ }^{4}$ The second "dinner and discussion" night is dedicated to participants sharing their experiences, stories, and overall reflection of the exercise. The shelters also provide a space to hold office hour and small classes.

Adding this aspect to the exercise also provides an avenue for participants to experience (once again only an approximation) the incomplete protection that makeshift shelters provide against the elements. On the Mary Washington campus we have experienced torrential downpours, below freezing cold spells, and unusual heat waves. Participants have witnessed food not properly stored spoil due to the rain or heat. Others have had their food taken or partially consumed by squirrels and dogs. While the squirrels and dogs may be lighthearted moments, food spoiling is not. These moments provide a valuable opportunity to talk about some of the risks that accompany the life of those living in slums. Risks we have mitigated with climate-controlled dwellings constructed of robust materials.

If you and some of your students choose to construct and live in shelters on campus, maintaining close communication with your university is necessary. On the Mary Washington campus, university officials keep the instructor informed of the possibility of inclement weather.

[^3]In the case of inclement weather, all participants are required to move to a nearby building (left unlock for this purpose by campus police) or return to their dorm rooms.

## Journal and Blog

The Two Dollar Challenge can be a transformative experience. Its emotional and physical discomforts can inspire significant reflections from participants. We believe that it is in those reflective moments that the educational value of this exercise resides. Indeed, we believe that this value is magnified when it is expressed and shared with others. For these reasons, we invite participants to blog in an effort to introduce themselves to each other and document their experiences throughout the week (for example, with photographs and video-posts) (see Appendix: Blogging). We also strongly encourage our participants to use this forum to comment on the blog posts of other participants and share their overall reflections at the end of the exercise. Those who would like to keep their experiences personal can maintain a daily journal however, they are expected to make comments on the blog posts of other participants. We generally conclude the Challenge on a Friday and request participants to write their final blog post or turn in their daily journals, accompanied by receipts documenting their expenses over the week, before the following week's scheduled course meeting time. Of course, for those participants who choose to blog they simply turn in their receipts.

## Alternative Assignment

Not all students will choose to participate in the Two Dollar Challenge. There are a number of reasons which range from health concerns to scheduling conflicts with athletic events and university assignments. This is completely understandable. It is difficult for participants to maintain peak performance under these conditions. This project is physically, intellectually, and emotionally challenging. Some students decline to participate because of jobs and internships that require them to maintain a certain level of personal hygiene. We provide a number of opportunities in the weeks leading up to the Challenge for students to gather information about its requirements. We review the rules and code-of-conduct on the first day of class. As we get closer to the Challenge, we hold interest meetings outside of class and have had past participants come and briefly share their experiences during class. While there are numerous public opportunities to provide information, the decision to participate or not is a private one. A preliminary count of participants is possible at the meeting during which we review and have students sign the Code-of-Conduct (usually a few days before the Challenge begins). A final count is possible once the final blogs are posted and journals turned in. Some students may decide to participate and then drop out of the exercise and like we mentioned earlier others may decide to join in late. In both cases, after brief conversations with the student, we have awarded partial extra credit. For non-participants, we provide alternative ways for them to earn extra credit. The fundamental difficulty with crafting an alternative assignment is making sure that its associated workload is comparable to participating in the Two Dollar Challenge. There are two options we have used in the past: committees (see Appendix: Committees) and an individual research project (see Appendix: Alternative Assignment).

## RESULTS AND REFLECTIONS

The motivation behind structuring the Two Dollar Challenge was to explore an alternative way of approaching the economic lives of the poor within the classroom. Beyond that motivation, we have four goals: provide participants with an opportunity and motivation to act, engender empathy, inspire critical reflection, and raise awareness of global poverty. There are numerous constraints, beyond a limited income, that the poor confront and the Two Dollar Challenge cannot simulate; however, even with these limitations it has proven successful at realizing our goals. In the following sub-sections, we present the results of a survey we conducted with past participants, reflections from past participants, and additional information as evidence in support of each of our four goals. Table 1 reports demographics and summary statistics of the survey respondents. [Insert Table 1 about Participant Information here].

## Provides an Opportunity and Motivation to Act

The Challenge provides its participants an opportunity to act by partnering with non-profit organizations that are actively engaged in alleviating poverty. [Insert Table 2 titled Participating Campuses and amount raised for Non-profit Organizations here].

Table 2 details the campuses and their respective courses that have participated in the Two Dollar Challenge and the amount of funds raised for each non-profit partner. On average, the Challenge has been a successful fundraiser. As far as motivating participants to continue taking steps to address global poverty after the Challenge, when asked in the survey "How much did TDC affect your desire learn about and/or help to alleviate poverty?" eighty five percent of respondents reported that the Challenge increased their desire to learn more about global poverty,
as reported in Table 3. [Insert Table 3 titled Affecting student desires to learn about and/or help to alleviate poverty].

The following journal entry from a past participant says it all:


#### Abstract

"Challenge is over and my roommates at the shelters have dispersed. I want more. I want to learn more about what we did, and what we could do. I want to have more engaging, passionate conversations about economics and microfinance. I want to know all the things that I don't know, but that I got a glimpse of at the Two Dollar Challenge. This Challenge has created a passion in me that I have never felt in any other class or activity. I have never been so excited...not like this. I want more." - Anonymous Student


## Engender Empathy

When asked in the survey "What affect did TDC have on how much empathy you feel towards those living in poverty?" eighty four percent of respondents reported that the Challenge increased the empathy they felt towards those living in poverty, as reported in Table 4. [Insert Table 4 titled Engendering student empathy here].

When survey participants were asked to "please describe how the TDC contributed to your feelings of empathy towards those living in poverty", one survey participant responded:
"I can't overstate the impact that really experiencing it had. I've heard and seen countless people who have transformed in their view of poverty: TDC allowed them to identify with those in poverty as fellow human beings. Even those who don't participate, when hearing the stories of those who do, come away with a richer understanding of the complexities of poverty."

Another survey participant responded:
"A process of questioning who I am in the world and what my place is in it. How can one sleep on the cold dirt without being thankful for their own bed and blankets back home? How can one return home to that bed without thinking of the rest of the world who don't have that comfort? Why am I so lucky? Now what can I do with that?"

## Inspire Critical Reflection

Each year we ask ourselves and participants whether or not it is appropriate to simulate poverty and during our first "dinner and discussion" night, we actively probe our motivations for participating in the Challenge and issues surrounding global poverty in general. When asked in the survey "How much would you say the TDC caused you to reflect critically? Such reflection may be about the purpose or other aspects of the TDC, aspects of economic development, personal development, goals or beliefs etc.?" all of the respondents reported that the Challenge caused them to reflect critically. Indeed, sixty-four percent reported that the Challenge caused
them to critically reflect "a lot," as reported in Table 5. [Insert Table 5 titled Critical Reflection here].

Additional evidence that the Two Dollar Challenge does succeed in inspiring critical reflection was captured by the survey when we asked participants to "please describe what the TDC caused you to critically reflect on."
"Some of the deepest, most thought-provoking conversations I've ever had have come out of TDC, forcing me to confront issues that often I'd rather just ignore or gloss over, and it's made me a better person, and I think it will make the development community stronger and more effective."

Another survey respondent stated:
"It introduced self-criticism as something we must constantly be doing. Asking ourselves if we really know the best thing for people in absolute poverty, seeing as we have never experienced it ourselves?"

One more response:
"TDC served as a forum for us to challenge one another's assumptions about poverty, and to encourage reflective and critical dialogue about poverty and the efficacy of economic development efforts."

When asked in the survey "How much do you think you learned about poverty or other aspects about economic development as a result of your experience in TDC?" ninety-two percent of the responded reported an increase in learning with thirty-one percent reporting "a lot," as reported in Table 6. [Insert Table 6 titled Learning about economic development as a result of TDC here].

We also asked survey participants to "please describe something you learned about poverty or other aspects about economic development as a result of your experience in TDC", one survey participant responded:
> "Rather than just reading dry accounts of poverty, TDC allowed me to really experience some small slice of poverty in a more visceral way, energizing and charging me with a much stronger responsibility towards economic development, while still grounding me with a critical viewpoint towards any potential action."

Another survey participant left the following comment:
> "The simple chore of boiling water during the TDC week illustrated how a simple glass of water - which we can procure in seconds - could be complicated by a lengthy walk to and from a water source and the process of building a fire, boiling the water, and waiting for it to cool. Even just this one task could take a significant amount of time away from each day for a lifetime, not to mention the other myriad tasks women in developing
countries perform daily. Our infrastructure, technology, and institutions really do give each of us an unspeakably huge advantage."

## Raise Awareness

The Two Dollar Challenge is a conversation starter about global poverty. Every interaction with a participant and a non-participant - whether at the dinner table, on campus, or in surrounding community - is an opportunity to inform a larger audience about the pervasiveness of poverty and the role of his/her chosen non-profit partner in eradicating it. When asked in the survey "How much do you think you contributed to spreading awareness about poverty or other aspects about economic development as a result of your experience in TDC?" eighty-eight percent of the respondents reports that they contributed at least somewhat to spreading awareness, as reported in Table 7. [Insert Table 7 titled Spreading awareness as a result of TDC here].

When we asked survey participants to "please describe how you contributed to spreading awareness about poverty or other aspects about economic development as a result of your experience in TDC", one survey participant commented:
"TDC provides a platform for discussion, a reason to start a conversation. Through the living on $\$ 2$ a day exercise I engaged in conversations with family, local businesses, classmates, and even some media outlets."

One participant stated in a journal entry:
"I got my friends and people I knew involved. That is neat. It is hard to just one day bring up "Hey, so about poverty..." at the dinner table, but it is another thing entirely to bring it up as something you are doing in class." Anonymous Student

Moreover, since the fall of 2006, the Two Dollar Challenge (on the University of Mary Washington, Front Range Community College and other campuses) has regularly been featured in the university paper. On seventeen occasions, the Two Dollar Challenge has been highlighted by local, regional, and national media - including, television, radio, newspaper, podcast, and online blogs. ${ }^{5}$

## CONCLUSION

The Two Dollar Challenge strives to provide an approximation of a poor individual's context. However, at its best, it provides a very incomplete one. Beyond a severely limited income, there are a multitude of additional constraints that the poor confront in developing and transitioning economies - constraints that simply cannot be approximated. Although living on only $\$ 2$ a day, participants can expect that their body and physical possessions are protected against the predation of others. The Challenge is conducted within the context of a stable society. There is no immediate threat of political upheaval. There are no hordes of bandits roaming through campus. Participants have continued access to campus security. Indeed, they can expect that those tasked with the responsibility of protecting them will not prey upon them. There are no impromptu checkpoints by which university officials can tax participants indirectly by coercing

[^4]bribes. In the case of inclement weather, participants have a ready retreat to the comfort and warmth of university buildings. Although participants have to boil their water, they know that it is safe to drink. Although participants are only permitted to bathe from a sink and are limited to only two complete outfits of clothing, when they interact with the wider college community they can feel confident that for the most part their community will receive them without discrimination. Participants have continued access to health-care including relatively low-cost prescription drugs and follow-up care. There is no threat of malaria or water-borne diseases. There is sanitation. Their intake of food and drink is more constrained than usual; however, they still have the opportunity to enjoy a well-balanced vitamin and nutrient-rich diet. More importantly, participants are only feeding one mouth!

All of the aforementioned are additional constraints that the poor confront. They may have to gather fuel for warmth and light. They may have to retrieve water and then proceed to purify it. They may have to defend themselves against the predations of others. The Challenge cannot simulate these additional constraints. However, the aforementioned evidence suggests that the Challenge does succeed in engendering a deeper understanding, deeper than what a lecture could provide, of the daily lives of the poor.

The Two Dollar Challenge can be customized to fit any campus setting - small colleges with a large resident student body or community colleges with a small resident student body (see Appendix: Community Colleges) - and course that has the opportunity to address global poverty. You can ask your students to live on two dollars a day for fewer than five days (we recommend at least three days minimum) and with or without adhering to some of the rules. You can find
additional resources - lecture notes, discussion topics, and other resources to facilitate your use of the Two Dollar Challene in the classroom - on our homepage. ${ }^{6}$

When it comes to assessing its educational value, we like to focus not only on the intellectual aspects but also on the emotional aspect. The physical discomforts that attend the Challenge will recede at its conclusion, however, the emotional discomforts linger. We believe that it is the emotional discomforts that begin the transformation of participants from passive observers of poverty into engaged actors in its alleviation. This sentiment, this hope, is captured by the following comment from a survey participant:
"TDC is...an inspiring personal journey. The lesson sticks around. It is worth as much or more than a semester-long class in terms of its ability to shape perspective and inspire students to change and grow."

[^5]
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## Appendix

## Assignment

Assignment: From Monday, April 5 (starting at 7 am ) through Friday, April 9 (ending at 4 pm ) we will be conducting the Two Dollar Challenge. Here are the ways in which you, as a student enrolled in Economics 384: Economic Development can be eligible for extra credit.

## 1. Participate in the Two Dollar Challenge

A. Live on $\$ 2$ a day and adhere to the rules and code of conduct during the week of the project. See http://www.twodollarchallenge.org/ to download the participant's manual.
i. Please note that living in the shelters on campus is optional. You are free to move in and out of the shelter during the day and night. You can spend all four nights in the shelter or some nights in the shelter and other nights in the dorm or your home.
B. Keep a receipt of all your expenditures during the week. Keep a $\log$ of the items and amount you would have purchased throughout the day. Calculate this difference.
C. Join our Poverty Discussion Forum (hosted by MFI Connect). Here is how:
i. Sign Up: (http://www.mficonnect.com/main/authorization/signUp)
ii. Join the TDC Group on MFI Connect:
http://www.mficonnect.com/group/twodollarchallenge
iii. Here is where you will blog and post comments on other blog entries. You are expected to make at least one daily blog post on MFIConnect and at least 1 comment on another student's posting each day.
a. Here you can post pictures and videos
b. Remember that you are an ambassador for the University of Mary Washington so be professional. When participating in the challenge, including blog entries, please adhere to the TDC Code of Conduct included in the participant's manual. Be respectful. Disparaging remarks in relation to others' ethnic or racial background, sex, sexual preference, age, disability, socioeconomic background, etc. will not be tolerated.
iii. Those who would like to keep their experience personal can keep a daily journal - however, you will be expected to make comments on others' blogposts.
D. On the Tuesday following the Challenge, you will need to turn in your Signed TDC Code of Conduct Sheet with your receipts attached. If you kept a personal journal, you are required to turn this in as well.
2. If you cannot participate in the Two Dollar Challenge, you can still earn extra credit:
A. Alternative Assignment
B. Work on Planning Committee

Please note that in no way is your extra credit tied to your willingness and/or ability to garner donations for the Two Dollar Challenge's Non-profit partner.

Remember that you are operating under the honor code.

## Appendix

## Extra Credit

Using extra credit to motivate students to participate in the Two Dollar Challenge was a decision we revisited multiple times. On the one hand, we want students participating because they want to earn experiential wisdom not extra credit. On the other hand, we have had participants remark, through informal communications and in their blogs and journals, how they were motivated to take on the Challenge by the extra credit. Yet, having had the experience, they would do it again without the chance for extra credit. We have concluded that extra credit gives us the opportunity to engage those students who may not have given global poverty much thought into a deeper reflection of the issues that surround it. In some ways, this is where we believe the Two Dollar Challenge makes its biggest educational impact.

Over the years, the extra credit we have awarded has ranged from $1 \%$ to $5 \%$ of the total grade. Most recently, in one of our upper level economics course, the extra credit accounted for $3.75 \%$ of the total grade. You may have some participants drop out and others join the Challenge sometime during the week. On these occasions, we have awarded partial extra credit. In general, the decision of how much extra credit to award is arrived at by weighing the effort participants put into their journals and blog, their participation during the dinner and discussion nights, and casual conversations with participants over the course of the exercise.

It is important that you make it absolutely clear to participants and non-participants on the Committees that their extra credit is in no way tied to their willingness and/or ability to raise donations for your non-profit partner. [Insert Table 8 titled Participation Summary here]

## Appendix

## Rules

1. All goods and services consumed over the five days must be newly purchased out of your $\$ 2 \mathrm{a}$ day income. These items include, but are not limited to personal hygiene products, cosmetics, cell phones (pay phones are allowed) and other personal electronic devices, and any stored food or drinks. You cannot use your meal plans over the five days.
2. With just a few exceptions, you cannot use any part of the wealth you enjoyed before the beginning of the week.
3. Gasoline must come out of your income.
4. Water taken from a private (personal tap) or public source (water fountain) must be boiled before it can be consumed. You are permitted to use a pan and stove top without charge. For safety concerns, you are allowed to bring an appropriate container for boiling water into the simulation.
5. There will be no showers. You can bathe from a public water source (for example, a common sink), however you are not permitted to use the hot water tap. You can use other means to heat water to desired temperature for bathing.
6. Your consumption of electricity should coincide with nature. For example, lights can come on when the sun rises but must go out at sunset.
7. Your consumption of heat will not be constrained. Indoor heating is permitted.
8. You are permitted two complete outfits of clothing. Both complete outfits must be kept on your possession for the duration of the project. Layering is encouraged.
9. You can barter for additional goods and services that you wish to consume outside of your \$2 a day income. You must provide a service in exchange for these goods (for example, cleaning a dorm room). You cannot ask friends or family members, but are encouraged to seek out individuals within the larger university community for assistance.
10. Any monetary assistance you receive during the five days cannot be used for consumption. It must be donated to the cause that all of your fundraising efforts are going towards.
11. During the Challenge there may be campus events which include free food. The food at these events is off-limit.
12. Food cannot be accepted from friends and family. Unsolicited food donations can be accepted to help facilitate communication with those in the community who show interest.

## Exemptions

1. Gasoline consumption for commuter students and those who drive to work or internships.
2. Dependent family members.
3. Consumption of all health related goods and services.
4. Uniforms for work or extracurricular activities.

## 5. Refrigeration

6. Pots and Pans for boiling water

If you are planning on staying in the shelters overnight, you are allowed to bring in the following wealth:

1. Sleeping Bag
2. Blanket
3. Tarp

## Appendix

## Purchasing Power of Parity

A common question raised by TDC participants is that $\$ 2$ in the developing world purchases much more than in the United States and as such, how can this be directly comparable? The short answer is that the $\$ 2$ amount has been adjusted for purchasing power of parity (PPP). As an illustration, consider the following example. Seventy five percent of the population living in Mumbai, India earns 92 Rupees per day, which is equivalent to $\$ 2$ using the spot exchange rate on August $6^{\text {th }} 2010$. Although this nominal exchange rate helps in interpreting Rupees for \$ and vice versa, it does not help in addressing our PPP question. To do so, a weighted purchasing power of parity index by Daniel Kalt at UBS Wealth Management Research, derived from a monthly basket of 122 western goods and services, is used. The index value was normalized to New York=100, and $\$ 2,969$. For Mumbai, the index value is 30.9, representing that the same reference basket would be approximately $70 \%$ less expensive at a cost of $\$ 916$. Therefore, at $\$ 60$ per month, $\$ 2$ per day, $75 \%$ of the population in Mumbai lives on what could be purchased for $\$ 194$ per month in New York ( $\$(60 / 916) \times 2,969=\$ 194)$.

For example, let us assume that Veneeta lives on $\$ 2$ per day in Mumbai. If Veneeta were to move to New York to live for one month, then in order to keep parity between her purchasing power in New York and Mumbai, we would have to give her $\$ 194.00$. Some could argue that the Two Dollar Challenge is too harsh because it asks students in the United States to live on $\$ 2$ per day. In other words, if participants were asked to live on $\$ 2$ per day for a month in New York, then the rules would only allow them an income of $\$ 60$. Veenata, on the other hand, would
get $\$ 194$ to live in NY for a month. We would argue that this discrepancy in monthly income obscures the fact that participants in the Two Dollar Challenge enter the simulation with some fixed wealth (clothes, access to electricity etc.) and are essentially only spending the $\$ 2 /$ day on food and some toiletries. The use of the two dollars per person per day income constraint is purely symbolic.

Finally, it would be apt to note that the $\$ 916$ cost for the reference basket is less expensive vis-à-vis $\$ 2,969$ in New York and reasons for such a disparity are as follows. The basket of goods and services used in the index is subjective and the composition would most likely vary significantly across and within countries. Furthermore, structural conditions in labor markets, international trade regulations, and variances in commodity pricing will alter the analysis. For example, labor-abundant countries tend to have lower prices for services such as taxi rides relative to capital-abundant countries and countries with more union involvement will experience higher labor costs (Krugman and Obsfeld, 2009). Such complexities, although significant, do not hinder a participant's ability to gain insight into global poverty, and can offer an additional educational component when discussions on PPP arise. It should also be noted that use of purchasing power of parity has long been an accepted method for comparisons across countries by international institutions such as The World Bank and International Monetary Fund.

## Appendix

## Code of Conduct

1. As students representing an educational program and liaisons for our partner economic development organizations, stealing absolutely cannot be tolerated.
2. All University rules must be followed.
3. Those who participate in the Two Dollar Challenge will face physical and emotional hardships, but they are still expected to participate in all class work and other assignments.
4. Begging from local businesses and others is allowed, but you must beg first and explain the Challenge later. By begging a participant experiences the emotional process involved, and after this initial exposure explaining the program provides an opportunity to spread awareness of world poverty and economic development.
5. At all times participants must respect those nearby who are truly in need. If at any time those participating in the Two Dollar Challenge are using resources which are valuable to indigent residents in the area this action must be re-evaluated.
6. Food on campus - you are allowed to accept food from community members, because this provides an avenue for others to come to us so that we can share our experiences, however you
are not allowed to eat free food on campus. If it is discarded that is fine, but no free cookouts or food from clubs.

The Two Dollar Challenge is an educational exercise which is designed to help aid in the transformation of a student into an empowered actor in the eradication of poverty. Participants are expected to act in a respectful manner at all times and strive to spread awareness and inspire activism in every interaction. By taking part in the Challenge a participant becomes a liaison for those living in severe poverty around the world as well as a representative of their college or university and the organizations which we have chosen to partner with. By participating you agree to the above Code of Conduct and to act in a respectful and sensitive manner throughout the Challenge.

## Participant Name

Date

## Appendix

## Blogging

The blogging component of the Two Dollar Challenge is a collaborative learning process that allows students to connect with each other and share their experience, thoughts, and coping suggestions. It provides a social networking aspect to the Challenge that forms a sense of camaraderie and empowerment against global poverty. In addition, blogging has been used as a graded component of the extra credit assignment. For example, requiring at least one original posting and one comment on another student's posting a day. Setting ground rules for the blog forum helps the student to understand what is expected of them and what is considered unacceptable behavior. Three Rules for the Blog Forum:

1. Please remember that the culture of mutual respect is part of this course.
2. Participation in the blog is required for extra credit, unless journal option is elected. However, commenting on another student's posting each day is always required.
3. Participation alone is not enough; a thoughtful and meaningful approach in your posts is required- Quality counts!

Setting-up an online blog for your class can be done using one of the many blogging websites such as Google® Blogger or Yahoo® Pulse. In the past, one website of choice has been http://www.mficonnect.com/. Mficonnect.com helps students to share their experience not only with others at their university but also people from around the world all working to fight global poverty. Additionally, students can connect with others taking the Challenge at colleges across
the country. This platform for sharing ideas and experiences from many regions around the country helps to further amplify the empowerment that students feel when participating in the Two Dollar Challenge.

## Appendix

## Committees

In the past, we have had students participate in one of a number of committees associated with running the Two Dollar Challenge on campus.

Public Relations Committee: is tasked with creating awareness about the project. Toward that end, students are responsible for contacting the university newspaper and, in the weeks leading up to the project, canvass the university campus and local businesses to spread awareness. In the past, students on this committee have started a group on Facebook and assisted in the development of a webpage for the Challenge. There we have posted links to the aforementioned blogs and pictures. Through the efforts of the Public Relations committee, you can expect this project for one class to be transformed into a university-wide event

Treasury Committee: is established with its own constitution to handle donations (see http://twodollarchallenge.org/instructors/ for additional resources).

In each case above, we advise you to select a committee leader - one student you will interact with and receive updates from. One of the drawbacks of using committees as an alternative to individual participation is the oversight that the instructor must provide in order to monitor and reward the contributions of committee members. We have traditionally allowed the committees to police themselves. However, this does not preclude the emergence of difficulties - like some students free-riding off the effort of others. In addition to serving on committees, non-participants can also earn extra credit by writing short papers (see Appendix: Alternative Assignment).

## Appendix

## Alternative Assignment

Non-Participants can earn extra credit by completing an alternative assignment:

## I. Directions

1. Go to the following homepage:
http://www.copenhagenconsensus.com/The\ 10\ challenges-1.aspx
2. Choose one of the ten global challenges enumerated. Download the "Challenge Paper" and any "perspective" papers included to write a 5-7 page overview of the global challenge.
II. Suggested Outline

## 1. Briefly describe the Copenhagen Consensus

- What does the CC propose to do? How does it propose to do it? Why is this exercise important? Keep this brief.

2. Overview of the Challenge you have selected to focus on

- Focus on the theoretical link between overcoming this challenge and economic growth. Another way to state this is - if this challenge is overcome, why should we expect to witness a reduction in poverty? Here you want to turn to the class lecture notes to support your theoretical link.

3. Overview of the Opportunity that will supposedly allow us to overcome this challenge

- What do the proponents of the policy say? Why do they advocate this policy?

4. Critique of the Opportunity and/or the Challenge as well

- What do opponents to this opportunity say? Why do they believe that the pursuit of this policy will be ineffectual?

5. Concluding Thoughts

- Here there may be opportunity for you to make a judgment


## Appendix

## Community College

Conducting the Two Dollar Challenge at a community college will operate in much the same way as was previously outlined for a 4-year university. However, experience has found that the diversity of student population attending a community college may differ from that of a 4-year. The average age of the student body, for example, tends to be greater. Student life programs, though every bit as extensive as a 4-year, do not entail on-campus living or fraternity housing. Structural differences may also be present and include such factors as socioeconomic and/or household composition. Therefore, the following caveats and suggestions will help to ensure success:

1) The necessity of commuting via car or public transportation does not preclude students from participating. However, suggesting carpooling or biking demonstrates to the student that he/she can still be included even though they may live a great distance from campus. The simple act of having to contemplate an alternative means of transportation demonstrates to students the hardships faced by those in developing nations when trying to work and/or obtain an education without a reliable means of travel.
2) Given the distance from home to campus and/or family obligations, some students may be unable to participate in on-campus shelters. In the past, these students have found that they can mimic this aspect at home (at least to some degree) by using a sleeping bag on the floor and the use candle light. Encouraging these students to attend the dinner and
discussion session at the shelter will help create a social connection for them given the absence of their overnight stay.
3) When introducing The Challenge to the students, remind them that participating, either in a committee or The Challenge itself, offers you as the instructor more attributes to include in a letter of recommendation. This can be a strong incentive for community college students as many are shortly anticipating transfer to a 4-year degree granting institution.

| \# Survey Respondents | 39 |
| :---: | :---: |
| Participated Once | 72\% |
| Participated More than Once | 28\% |
| Female | 77\% |
| Male | 23\% |
| Earliest Year Participant Graduated | 2007 |
| Latest Year Participant Expected to Graduate | 2015 |

TABLE 2: Participating Campuses and amount raised for Non-profit Organizations

| Participating Campus | Amount <br> Raised | Non-profit <br> Organization |
| :--- | :--- | :--- |
| University of Mary Washington (Spring 2011), <br> Economic Development | $\$ 2,500$ | La Ceiba: MFI |
| Front Range Community College (Spring 2011), <br> Principles of Macroeconomics | $\$ 155$ | Opportunity <br> International <br> Opportunity |
| University of Mary Washington (Spring 2010), <br> Economic Development <br> Front Range Community College (Spring 2010), | $\$ 2,300$ | International <br> Opportunity <br> Principles of Macroeconomics <br> University of Mary Washington (Spring 2008), |
| Economic Development <br> University of Mary Washington (Spring 2007), <br> Economic Development | $\$ 375$ | International |

Table 3: Affecting student desires to learn about and/or help to alleviate poverty

| Likert Scale | 1: Decreased | 2 | 3: No Change | 4 | 5: Increased |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Percentage (\%) | 2 | 3 | 10 | 44 | 41 |

Table 4: Engendering student empathy

| Likert Scale | 1: Decreased | 2 | 3: No Change | 4 | 5: Increased |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Percentage (\%) | 0 | 0 | 16 | 33 | 51 |

Table 5: Critical Reflection

| Likert Scale | 1: Not at all | 2 | 3: Some | 4 | 5: A lot |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Percentage (\%) | 0 | 0 | 5 | 31 | 64 |

Table 6: Learning about economic development as a result of TDC

| Likert Scale | 1: Not at all | 2 | 3: Some | 4 | 5: A lot |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Percentage (\%) | 3 | 5 | 15 | 46 | 31 |

Table 7: Spreading awareness as a result of TDC

| Likert Scale | 1: Not at all | 2 | 3: Some | 4 | $5:$ A lot |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Percentage (\%) | 10 | 2 | 36 | 26 | 26 |

TABLE 8: Participation summary

| Semester | Class | $\begin{aligned} & \text { Lived } \\ & \text { on } \$ 2 \\ & \hline \end{aligned}$ | Total in committee | Total completing alternative assignment | Total | Total in class | \% <br> Participating |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Spring 2010 | Principles of Microeconomics | 11 | 16 | 2 | 29 | 47 | 62\% | 23\% |
| Spring 2010 | Principles of Macroeconomics | 5 | 10 | 0 | 15 | 36 | 42\% | 14\% |
| Spring 2010 | Economic Development | 9 | 0 | 0 | 9 | 39 | 23\% | 23\% |
| Spring 2011 | Economic Development | 20 | 0 | 6 | 26 | 42 | 62\% | 48\% |
| Spring 2011 | Principles of Microeconomics | 8 | 1 | 0 | 9 | 21 | 43\% | 38\% |
| Spring 2011 | Principles of Macroeconomics International | 4 | 0 | 0 | 4 | 49 | 8\% | 8\% |
| Spring 2011 | Trade | 2 | 0 | 0 | 2 | 6 | 33\% | 33\% |
|  | Total | 59 | 27 | 8 | 94 | 240 | 39\% | 25\% |


[^0]:    ${ }^{1}$ The Wold Bank listed on its website that "the world's population as of 2005 was 6.4 billion. Of those, 2.5 billion live on less than USD 2.00 a day and 1.4 billion live on less than USD 1.25 a day" The relative poverty line benchmark is $\$ 1.25$ per day. This reflects and upward estimate from a $\$ 1.00$ per day in 1996 (Ravallion, Chen, Sangraula, "Dollar a Day Revisited", 15-17.).

[^1]:    ${ }^{2}$ Nik Kristof on the Colbert Report 03/12/07.

[^2]:    ${ }^{3}$ For a list of possible causes with the necessary background information, you can visit the following homepages: Copenhagen Consensus: http://www.copenhagenconsensus.com/CCC\%20Home\%20Page.aspx World Bank -YouThink!: http://www.copenhagenconsensus.com/CCC\%20Home\%20Page.aspx Millennium Development Goals: http://www.undp.org/mdg/basics.shtml

[^3]:    ${ }^{4}$ Ivan Illich's "To Hell with Good Intentions" is very effective at getting participants to critically reflect upon their motivation for taking on global poverty.

[^4]:    ${ }^{5}$ You can view these seventeen entries on the Two Dollar Challenge homepage (www.twodollarchallenge.org)

[^5]:    ${ }^{6}$ http://twodollarchallenge.org/instructors/

