

Ministry of Transport and Communications

“The Better Connections Program”

Social and Economic Survey Research Institute

Qatar University

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This report presents the highlights of the Ministry of Transport and Communications Better Connections Program study carried out by the Social and Economic Survey Research Institute (SESRI) of Qatar University. The study included a set of survey questions to gauge migrant workers' feedback on the Better Connections Program. Working with employers, the Better Connections Program offers a framework to provide transient migrant workers with access to information and communication (ICT) tools.

SESRI was asked to assess what technology migrant workers use and for what purpose, how access to ICT impacts migrant workers' lives, and how participation in the program impacts the employers.

The Better Connections Program face-to-face survey interviewed both users and non-users of the Better Connections Program facility at the migrant workers' accommodations (compounds). Only accommodations (compounds) where the Better Connections Program has been implemented were included in the survey. In these compounds, an equipped computer room with access to the internet is made available to residents of the compound to use free of charge. In each compound the log of users from the facility management was used to select and interview users. Non-users of the facility were also identified to be included in the survey. Accordingly, SESRI conducted representative surveys of 860 workers, including 358 users and 502 non-users of the Better Connections Program, across 46 labor camps. In the report that follows, we present the results of this survey.

The results of this public opinion survey are found in the second section of this report, following the introduction. Respondents were assured that their answers would be confidential and presented in an aggregate format. This project was fully funded by SESRI. The statements made herein are solely the responsibility of the authors.

The survey was designed and carried out in accordance with the highest scientific and ethical standards. Respondents were assured that their answers would be confidential and presented in an aggregate format. The statements made herein are solely the responsibility of the authors.

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The Social and Economic Survey Research Institute (SESRI) is responsible for any errors or omissions in this report. Questions and comments may be directed to the Social and Economic Survey Research Institute via email at sesri@qu.edu.qa, or through our website at: <http://www.qu.edu.qa/sesri/>.

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Executive Summary

- The sample consisted of 860 participants, out of which 358 were users (42%) and 502 (58%) were non-users of their labor camp's computer room
- More than half of non-users (55%) are not aware of the existence of a computer room in their labor camp
- Users of labor camp's computer room were significantly more likely to report having vocational or secondary school completed as well as post-secondary or higher, compared to non-users; in other words, workers who are more educated tend to also be the users of the computer room (ICT lab)
- Users are significantly more likely to report owning a variety of electronic devices (smart phones, mobile phones, computers, tablets, and cameras); this could indicate that computer room users are more technologically savvy
- Both users and non-users feel confident in using either smart phones or mobile phones; however, computer room users are significantly more likely to report confidence in laptop and desktop use as compared to non-users
- The vast majority (90%) of users reported using the computer at least occasionally. This percentage is significantly lower among non-users (31%)
- Among the users of the computer room, 44% reported using it at least once per day
- The most common online activities are relatively similar among users and non-users. These activities include: communicating with friends and family, using social networking and messaging systems, and reading news from their home country. However, users are significantly more likely to engage in these activities than non-users
 - 74% of users reported "learning and developing their own skills", while only 55% of non-users reported this activity
 - Approximately 38% of users use the internet for financial information, while 25% of non-users reported the same
- Users were 20% more likely than non-users to strongly agree that the internet has given them the opportunity to learn new skills (78% versus 57%) and 15% more likely to report that the internet has improved productivity at work (63% versus 48%)
 - More users also reported that access to the internet helped reduce stress (64% versus 57%) and improve quality of life in Qatar (68% versus 58%) compared to non-users
- Most respondents reported that having access to the internet at the labor camp is "very important" (88% users and 79% non-users)
- Majority (90%) of users agree that the computer room makes their life in Qatar easier and 92% believe that it makes them more productive at work
- The most frequently reported reason for not using the computer room among non-users was being too busy or not having time to use it (50%), followed by lack of computer skills (25%)

- Almost half (47%) of non-users reported needing someone to help them use the computer room
- A quarter of users (25%) and 10% of non-users reported having participated in computer or internet training programs at their labor camps
 - Among those who reported having participated in the computer training programs, the vast majority (94%) reported that they were somewhat or very satisfied with the training
- The three most frequently reported barriers to participation in computer and internet training include:
 - Lack of devices after the training to practice their newly acquired skills
 - Timing of the training program and
 - Having a day off to attend trainings programs
- The three most frequently mentioned potential motivations to participation in computer and internet training include:
 - Free or low-cost access to internet,
 - Gift cards for internet access
 - Timing of the training program were
- More than two thirds (68%) of all respondents reported Friday as the most convenient day of the week to participate in training. Slightly more than half of all respondents (51%) reported evenings as most convenient time of the day for training
- Nearly three-quarters of all respondents (72%) reported “class delivery in a group with a teacher at set times (face-to-face)” as the most preferred format of training to encourage participation
- More than half of all respondents reported that training on email, basic computer and internet use as training elements that they would consider as most beneficial

I. Introduction

The Better Connections Program is a national initiative of the Qatari Ministry of Transport and Communications to help contractors and employers provide migrant workers with access to ICT tools and training within their accommodation complexes. The program consists of setting up fully functioning ICT facilities equipped with refurbished hardware, tailored training content, and training support for volunteers; all of which is free. The program enables transient laborers residing in Qatar to access the Internet and various ICT tools to engage in the ever-changing digital world.

The Ministry of Transport and Communications works with different strategic partners for the implementation of the program and to ensure its continuation and sustainability. The program owes its uniqueness from its sustainable framework made possible by a group of committed partners, each with the responsibility for delivering a major component.

The Better Connections Program is built around five pillars:

1. Refurbishing donated computers and software to minimize outgoings
2. Creating dedicated rooms in the camp for ICT access and training
3. Providing Internet connectivity through fixed or wireless solutions
4. Developing content and training modules tailored to the specific online needs of the labor force
5. Recruiting volunteers from the community to provide training and logistical support in the establishment of the ICT facility

The Ministry of Transport and Communications provides trainers and volunteers with in-house developed toolkits. These toolkits cover a ten-module curriculum as follows:

1. Learning how to use a computer
2. Discovering the internet
3. Accessing news online
4. Cyber-safety
5. Directions and using Google Maps
6. Connecting with friends and family using social media (Skype, Facebook, Twitter, etc.)
7. Mobile devices and applications
8. Managing files
9. Accessing government services online (Hukoomi)
10. Online learning

The training model cascades knowledge from volunteers to digital champions and then to the larger workers' community. Themes include induction to Qatar, safety at the workplace, mobile money and more. The training modules are audio-visual, and they are available online and offline in several languages, making them accessible to almost all migrant workers, at different hours of the day.

With the objective of improving the lives of many thousands of migrant workers and strengthening Qatar's digital culture, the Better Connections Program has grown into one of the largest public-private partnerships in the country with Microsoft and Vodafone Qatar making significant contributions. Such objective is in line with the Qatar National Vision 2030, which seeks to build a knowledge-based society.

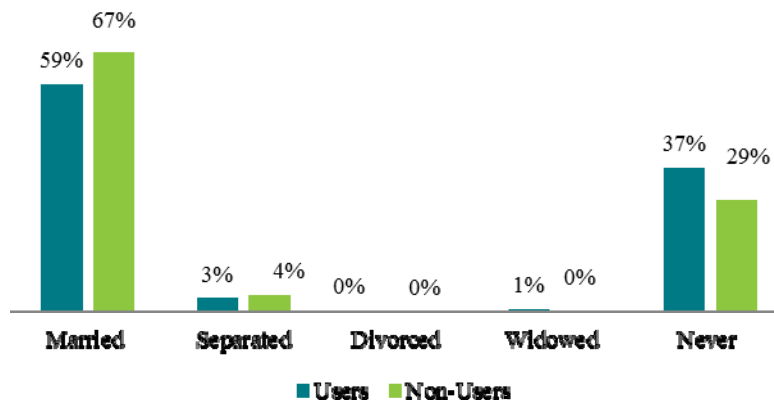
II. Demographics

Respondents were asked several questions pertaining to their personal and social characteristics for a better understanding of their demographic characteristics. The sample consisted of 860 participants, out of which 358 were users (42%) and 502 (58%) were non-users of their labor camp’s computer room. Users and non-users were originally supposed to be defined using a population list provided by the Ministry of Transportation and Communications (logs of users from computer rooms). However, since there was a significant gap between the time the list was assembled and data collected, field work showed that the list was not a reliable exclusionary criterion. Instead, users were defined using respondents’ answers: respondents who said they are aware of the Computer Room at their labor camps and they have used it were defined as **users**, while those who reported that they have not used the computer room, regardless of whether they were aware of it or not, were defined as **non-users**. Throughout the report, we differentiate the type of respondents using these two terms: users and non-users.

Marital Status

At the time of the survey, the majority of participants were married (59% of users and 67% of non-users), while around a third of them were never married (37% of users and 29% of non-users). The remaining others (4%) were either separated, divorced or widowed.

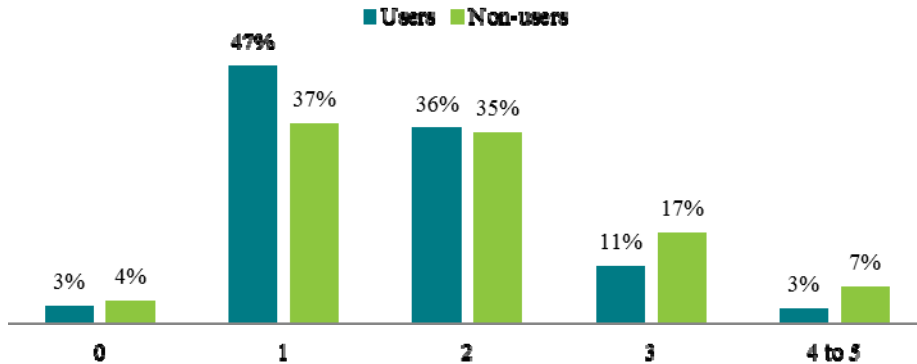
Figure II-1: Marital Status



Children and Spouse

All respondents were asked whether they have children under the age of 18. Around half of the married users (52%) and 61 percent of non-users reported having children, with the majority stated that they have three or less children (see Figure II-2).

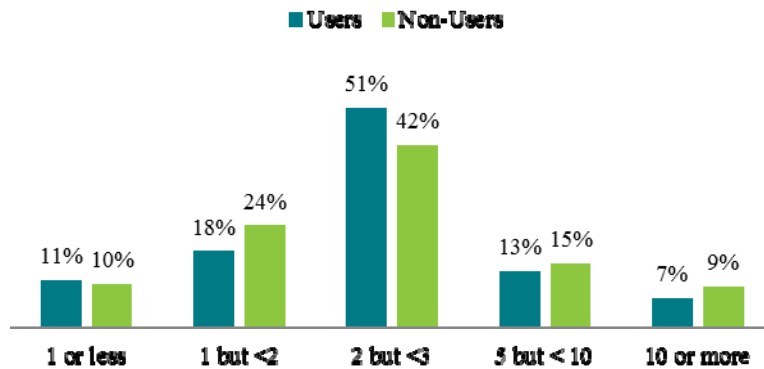
Figure II-2: Number of Children Under 18 Years Old



Years lived in Qatar

Users and non-users were asked about the number of years they have been living in Qatar. Around 80 percent of the users reported that they have been living in the country for less than three years, while 20 percent of them have been living for five years or longer. Similarly, three quarters of the non-users mentioned that they have been living in the country for less than three years, while a quarter of them have been living in Qatar for five or more years (see Figure II-3).

Figure II-3: Years lived in Qatar



Nationality and Ethnicity

As shown in Table II-1 below, the survey sample included a diversity of nationalities of both users and non-users of the computer room. Slightly more than one third of users (34%) and non-users (38%) were Indian nationals, followed by Bangladeshi and Nepalese respondents, three of which represent the largest communities of labor workers in the country.

Table II-1: Nationality

	<i>Users</i>	<i>Non-users</i>
India	34%	38%
Bangladesh	24%	21%
Nepal	18%	20%
Kenya	7%	1%
Philippine	6%	4%
Sri Lanka	6%	6%
Pakistan	2%	6%
Ghana	1%	1%
Others	0%	1%

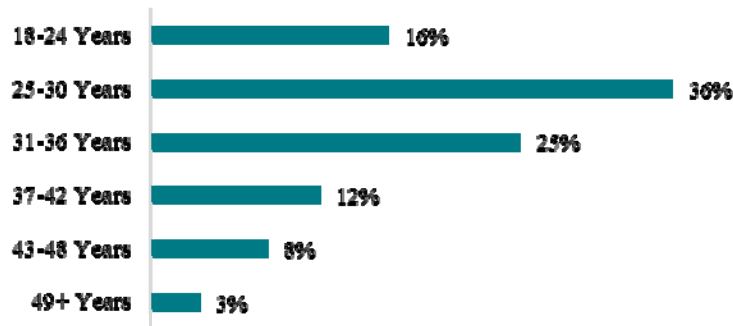
In terms of ethnic group distribution, the results reveal that majority of respondents (80%) reported being of Indian sub-continental ethnicity, followed by African (6%) and South-East Asian respondents (5%), with remaining 4 percent belonging to other ethnic groups.

Gender and Age

When it comes to gender, the user subsample consisted of 98 percent male and 2 percent female respondents, while the non-user subsample consisted entirely of males (100%).

At the time of the survey, more than a third of all respondents (36%) were between 25 and 30 years of age, while a quarter of them (25%) were between 31 and 36 years old, which were the two largest age groups (see Figure II-4). The average age of respondents was 32 years, and there were no significant differences between users and non-users in terms of the age distribution.

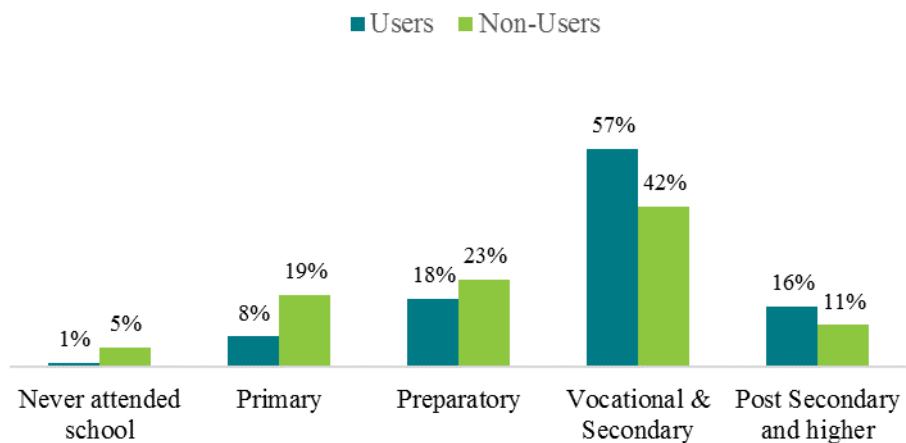
Figure II-4: Age categories



Education and Income

Respondents were asked to report the highest level of education they had completed. As Figure II-5 shows, non-users were significantly more likely to report having completed primary school (19% compared to 8% among users), and preparatory school as their highest level of education (23% compared to 18% among users). On the other hand, users were significantly more likely to report having vocational or secondary school completed (57%, compared to 42% among non-users), as well as post-secondary or higher (16%, compared to 11% among non-users). Therefore, individuals who are more educated tend to also be the users of the computer room (ICT lab) at their labor camps.

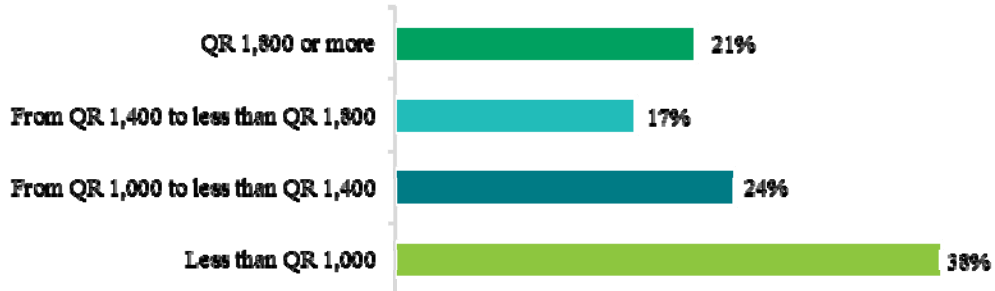
Figure II-5: Respondents' highest level of education



As for income level, more than one third of all respondents (38%) reported that their monthly income is less than QAR 1,000, while about one quarter (24%) reported earning an amount between QAR 1,000 to

QAR 1,400 (see Figure II-6). The results show that there is no significant difference between users and non-users in terms of their monthly income levels.

Figure II-6: Respondents' monthly income

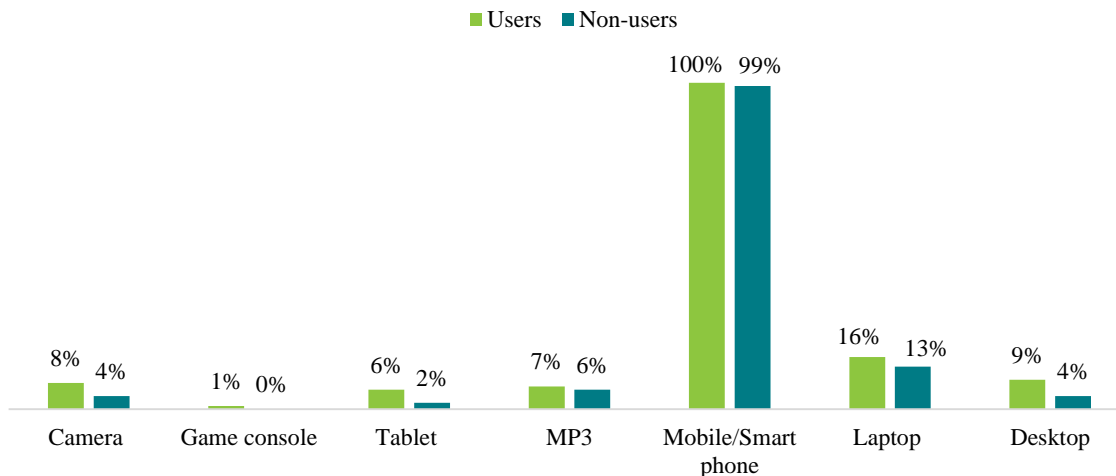


III. Familiarity with Technology

Ownership of electronic devices

All respondents were asked whether they personally own a variety of electronic devices. The vast majority of both users (100%) and non-users (99%) of the Computer Room reported having either smart phones or mobile phones, as displayed in Figure III-1. A minority of respondents reported having laptops (14%) or desktops (6%). Yet, these proportions are significantly higher for users than non-users of computer rooms. Specifically, 16% of users versus 13% of non-users have laptops and 9% of users versus 4% of non-users have desktops. This could indicate that users are more technologically proficient than non-users.

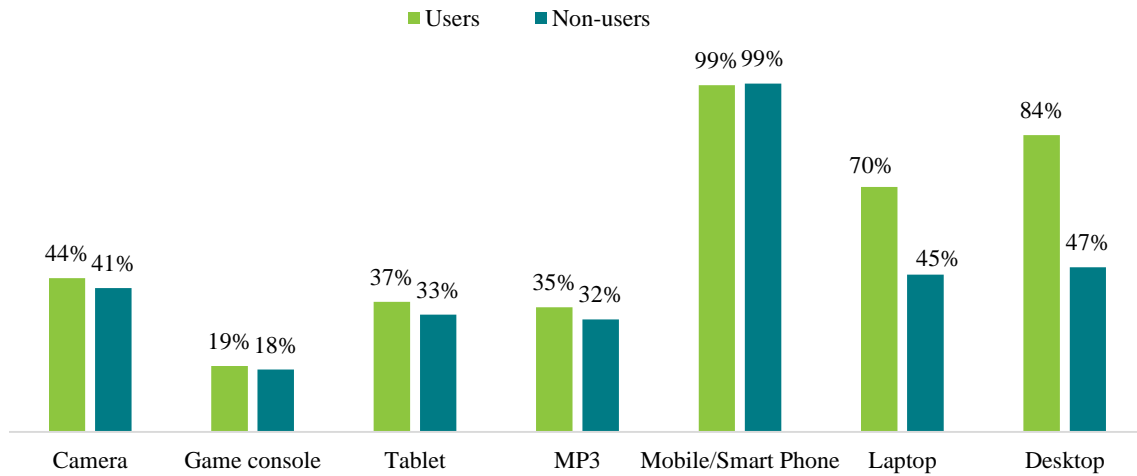
Figure III-1: Owning electronic devices



Confidence in using electronic devices

When asked if they are confident in the use of particular electronic devices, the results indicate high confidence for both users and non-users with either a smart phone or mobile phone (99%, respectively) technology, as seen in Figure III-2. However, the confidence in laptop and desktop use is much higher for users than non-users, with 70% of users expressing confidence in laptops versus 45% for non-users, and 84% of users expressing confidence in desktops versus 47% for non-users. This could be because technologically proficient migrant workers are more likely to use the computer room at their labor camp. It could also mean that workers using the computer room have become more proficient at using laptops and desktops.

Figure III-2: Confident in using the electronic devices



More than half (55%) of workers reported using a computer at least occasionally, as seen in Figure III-3. Significantly, while 90% of users reported at least occasional computer use, only 31% of non-users reported occasional use.

Figure III-3: Using a computer

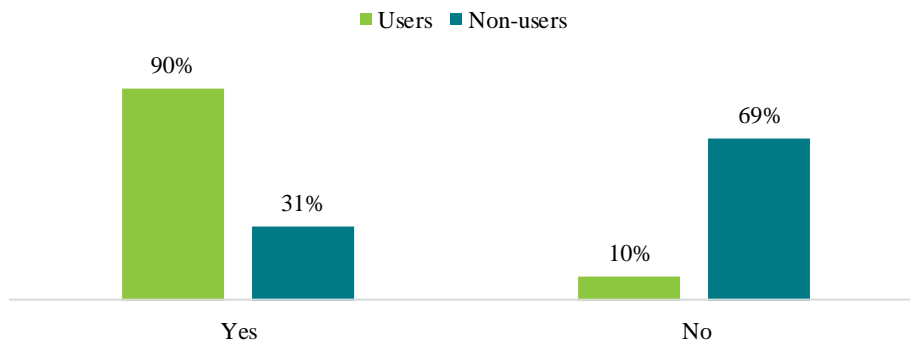
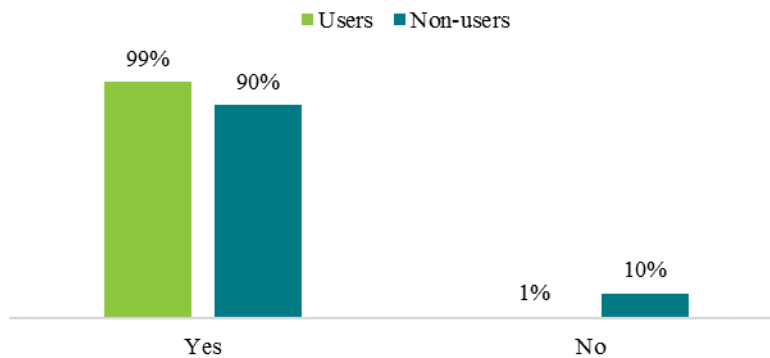


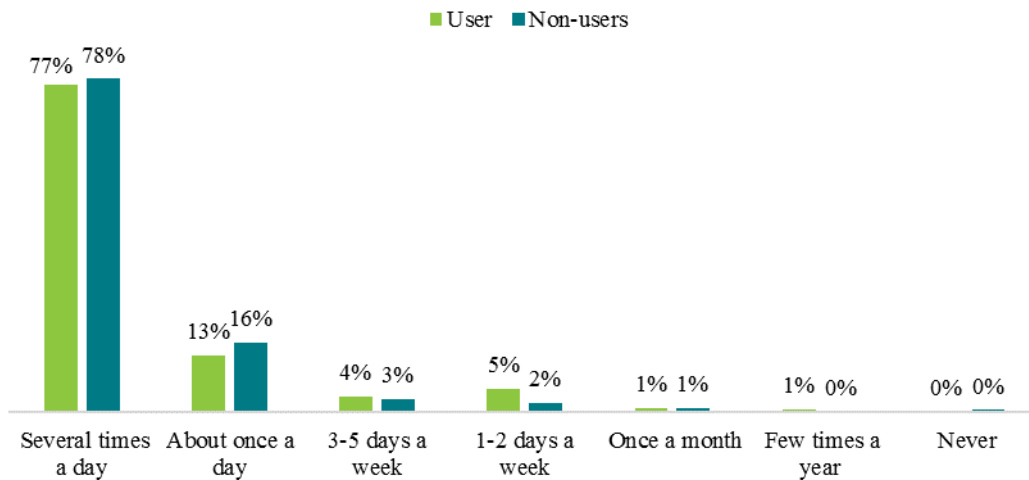
Figure III-4 shows that the vast majority (94%) of migrant workers in the camps use the internet, at least occasionally. This figure varies between 99% for users and 90% for non-users. Similarly, while less than 1% of users reported that they do not use the internet at least occasionally, this proportion rises to 10% for non-users.

Figure III-4: Using of the internet



Of those responding that they do use the internet at least occasionally, more than three quarters of both users and non-users reported that they use the internet several times a day, as displayed in Figure III-5. Concluding from previous questions, it is probable that the internet is being accessed via mobile or smart phones.

Figure III-5: Frequency of using the internet



Internet activities

Respondents were asked a number of questions about their internet activities, as seen in Table III-1 below. The most common activities reported are relatively similar among users and non-users. These include communicating with friends and family, using social networking and messaging systems, and reading news from their home country. Yet, for nearly all activities, the frequencies are significantly higher for users than non-users. Most importantly, users are much more likely to use the internet to undertake activities requiring the highest levels of technological skills or offering the greatest professional development potential. For example, 74% of users reported “learning and developing their own skills”

while only 55% of non-users reported this activity. Approximately 38% of users use the internet for financial information, while 25% of non-users reported the same. Similarly, 47% of users access the internet to look for jobs as compared to 31% of non-users.

Table III-1: The internet usage

<i>Think about when you access the internet, do you ever...</i>	<i>All</i>	<i>Users</i>	<i>Non-users</i>
	<i>Percent of Yes</i>		
Communicate with others (Calling family members or friends back home by Skype, MSN, or email)	80%*	86%	75%
Get financial information online	31%*	38%	25%
Buy or make a reservation online for a travel service, like an airline ticket, hotel room, or rental car	15%*	22%	9%
Do online banking such as sending money home to family and friends, sending money to your bank account at home, or paying loans	13%*	20%	8%
Use a social networking site such as Facebook	92%*	96%	88%
Use a messaging system such as WhatsApp or Viber	88%	91%	87%
Use Twitter or another service to share updates about yourself or to see updates about others	27%*	35%	20%
Access government services such as visa applications, health card renewals, paying traffic tickets.	18%*	23%	14%
Play games	47%*	53%	42%
Learn and develop your own skills	63%*	74%	55%
Look for jobs	38%*	47%	31%
Read news from home country	89%*	92%	86%
Keep up to date with news generally	78%	80%	77%
Play or download music/videos for entertainment	85%*	91%	79%
Browse for general information- for example, weather, construction delays, road closures	47%*	56%	40%
Pursue hobbies and interests	68%*	74%	63%

The asterisk symbol () is used to denote statistically significant differences between users and non-users at the 5% level.*

Internet access and usage

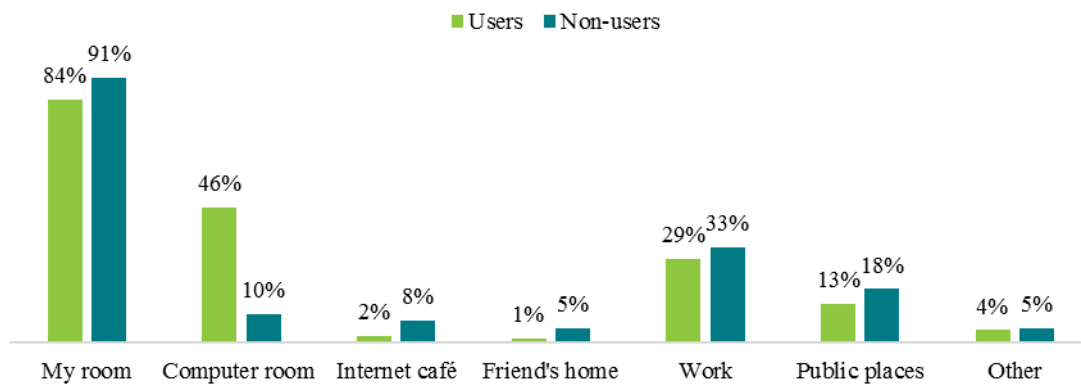
Respondents were asked if they use the internet on their own or whether they need help to use the internet. As shown in Figure III-6, more than 80% reported not needing help. While users were less likely to need help than non-users, the difference was not significant.

Figure III-6: Do you use the internet on your own or do you need help to use the internet?



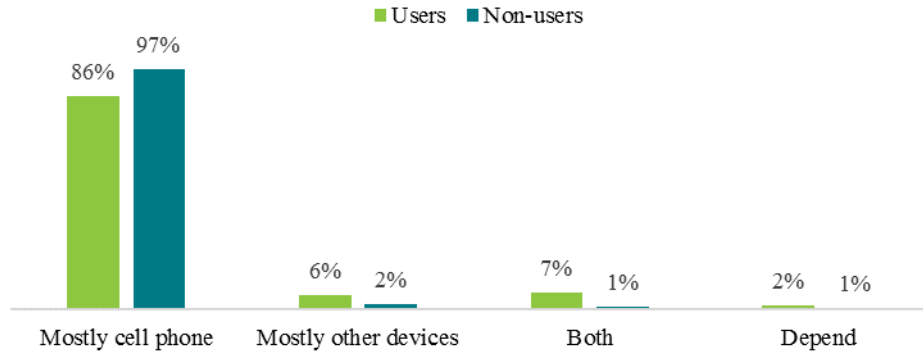
Figure III-7 shows that the vast majority (88%) of respondents – users and non-users – reported their room at the labor camp as the place where they access the internet. Yet, users were significantly less likely to report their room as the place of internet access (84% versus 91% among non-users). As expected, users were significantly more likely to report using the computer room as a place for accessing the internet (46% versus 10% among non-users).

Figure III-7: Places of accessing the internet



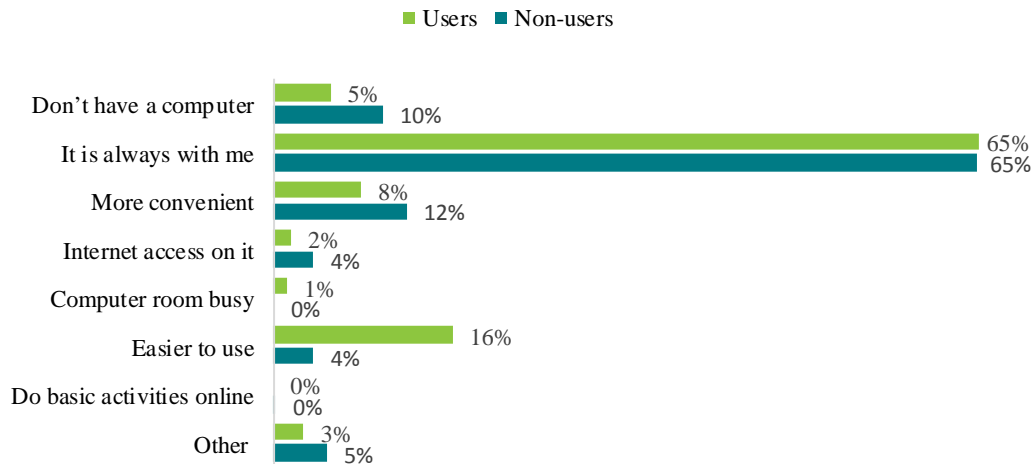
The vast majority of respondents use their cell phones to access and use the internet, as seen in Figure III-8. Non-users were more likely (97% versus 86%) to report using mostly their cell phones to access the internet rather than some other device. Users are likely taking advantage of the computers in the lab when not using their cell phones.

Figure III-8: Using cell phone verses using some other device



A key question from the previous result is why users and non-users report using the internet mostly on their cell phones. The reasons are shown in Figure III-9. For both users and non-users, it is the fact that the phone is always with them that makes it a more likely device for internet use. Users were more likely to find the phone as an easier device to use (16%) compared with non-users (3.6%). Non-users were more likely to report that they do not have a computer as a reason they use their phones (10% versus 5%).

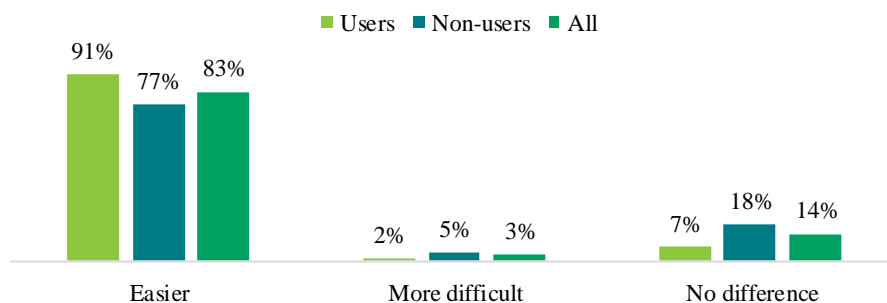
Figure III-9: MAIN reason of using the internet mostly on cell phone



Impact of the internet and benefits of internet access

Most respondents (83%) said that the main effect of internet access on their daily life was that it made life easier, but this number was significantly higher for users (91%) than non-users (77%). Non-users were more likely to say that internet access made their lives more difficult (5% versus 3%) or had no difference on their lives (18% versus 14%) (See Figure III-10).

Figure III-10: Effect of internet access on worker daily life



Overall, as seen in Table III-2, respondents strongly agreed that the internet has improved their ability to communicate with important people in their lives (74%) and stay in touch with their families and friends (86%). Each of these is more than 10 percentage points higher for users than for non-users. What is more, users were 20 percentage points more likely to strongly agree that the internet has given them the opportunity to learn new skills (78% versus 57%) and 15 percentage points more likely to report that the internet has improved productivity at work (63% versus 48%). Importantly, more users also reported that access to the internet helped reduce stress and improve quality of life in Qatar.

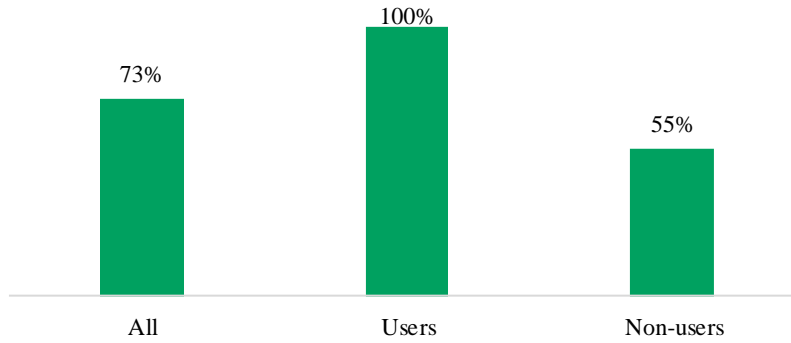
Table III-2: Benefits of internet access

	Users			Non-users		
	Strongly Agree	Somewhat Agree	Disagree	Strongly Agree	Somewhat Agree	Disagree
Access to the internet has made it easy for me to stay in touch with my family and friends.	92%	7%	1%	82%	12%	6%
Access to the internet has allowed me to stay informed about news and events in my home country.	87%	12%	1%	76%	18%	6%
Access to the internet has increased the level of communication that I have with many important people in my life.	81%	17%	2%	69%	22%	9%
Access to the internet has given me the opportunity to learn new skills.	78%	18%	5%	57%	29%	15%
Access to the internet has improved my quality of life in Qatar.	68%	28%	5%	58%	28%	14%
Access to the internet has helped me reduce the levels of stress and anxiety in my life.	64%	29%	7%	57%	26%	17%
Access to the internet has improved my productivity at work.	63%	28%	9%	48%	27%	25%

In order to ensure that workers benefit from the facilities offered by the Better Connections Program, they need to be aware of their existence. As displayed in Figure III-11, while all users are aware of the facilities, only slightly more than half of non-users (55%) are aware that there is a computer room at their

labor camps. This could be a sign that new initiatives are needed to improve the awareness of the Better Connections Program at the camps.

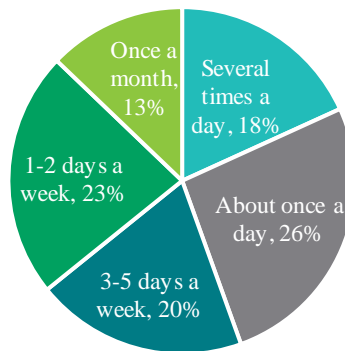
Figure III-11: Percent of respondents aware of the computer room at the labor camp



Users of the Computer Room

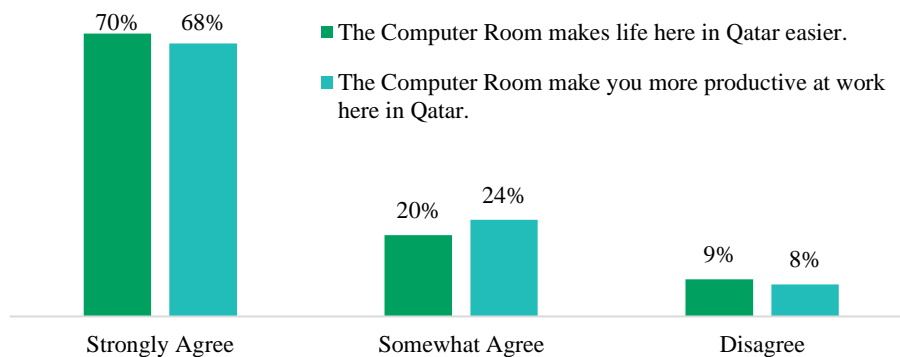
Users of the Computer Room were asked how frequently they take advantage of the computer room offered by the Better Connections Program. As seen in Figure III-12, 26% report using it every day and 18% use it several times per day. Thus, 44 percent use the computer room at least once per day. Others report using the computer room 3-5 days per week (19%) or 1-2 days per week (23%).

Figure III-12: The frequency of using the Computer Room at the labor camp



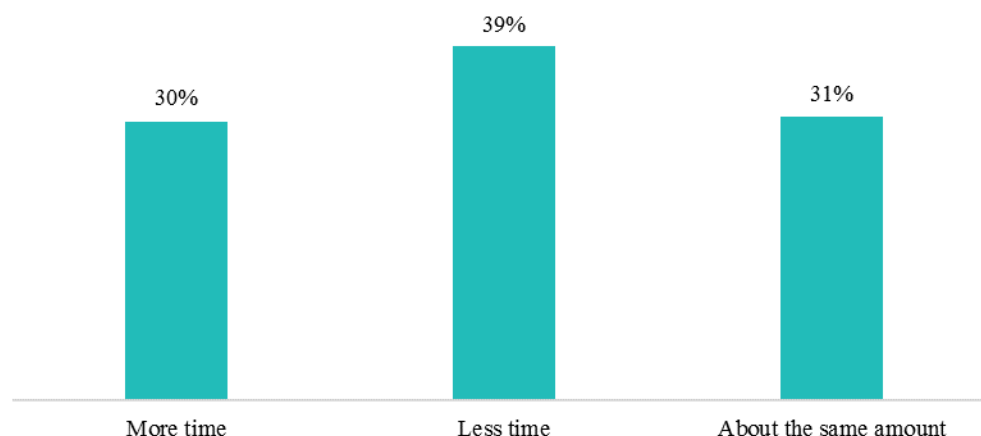
Users of the computer room were asked whether they agree or disagree with the statements that a) The computer room makes life here in Qatar easier, and b) The computer room makes you more productive at work here in Qatar. Overall, users of the computer room strongly agree that the computer room has made their life in Qatar easier (71%) and that it has made them more productive at work (68%) (see Figure III-13).

Figure III-13: Impact of the Computer Room



We asked respondents if, since they started using the computer room (ICT or Internet Café) at their camp, they would say they spend more or less time on the internet. The results are reported in Figure III-14. Interestingly, nearly 2 out of 5 (39%) respondents reported that they spend less time on the internet. Conversely, 3 out of 10 (30%) reported spending more time, and 31 percent said they spent about the same amount of time as before (see Figure III-14).

Figure III-14: Amount of time spent on the internet compared with before



Those respondents who stated that they spend more time on the internet today as compared with in the past were asked a follow-up question to identify the reasons for such an increase. The majority of users pointed to better access to internet at their camps (31%) or the computer room (24%) as the main reason for greater use, followed by access to mobile phone internet access (18%). This result is displayed in Table III-3.

Table III-3: What is the MAIN reason why you spend more time on the Internet today as compared to before?

	<i>Percent of Users</i>
Better access to internet on camp	31%
Access to internet by cell phone/mobile phone	18%
More free time	6%
Price of internet	0%
The computer room	24%
Equipped with new skills on how to use the internet	6%
More connection with family and friends	5%
Other	10%

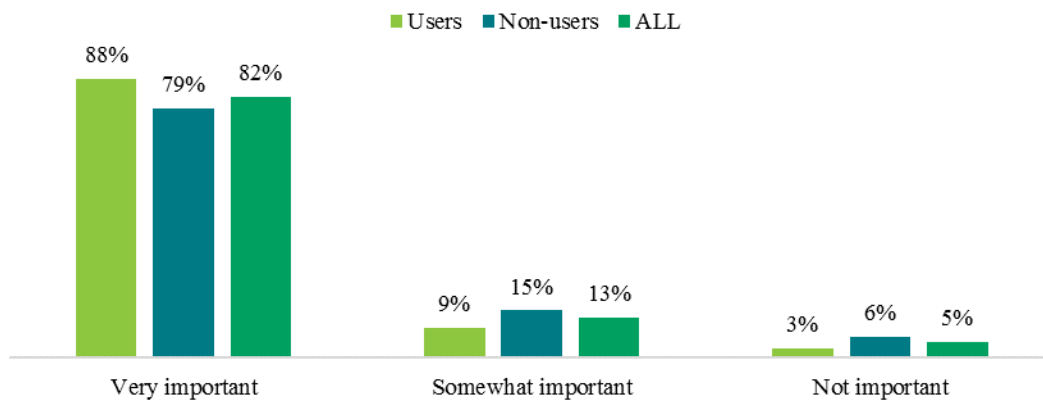
Those respondents who reported that they spend less time on the internet today as opposed to before they began using the computer room were asked a similar follow-up question. As shown in Table III-4 more than half (55%) reported less free time followed by more working hours (22%) as the main reason.

Table III-4: What is the MAIN reason why you spend less time on the Internet today as compared to before?

	<i>Percent of Users</i>
Less free time	55%
More working hours	22%
No access to smart phones	5%
Price of internet connection	2%
Other	16%

All respondents, users and non-users alike, were asked about the importance of having access to the internet at the labor camp. As displayed in Figure III-15, most respondents (82%) reported that having access to the internet at the labor camp is very important. This percentage is significantly higher among users of the Computer Room (88%) as compared to non-users (79%). Overall, 5 percent of all respondents said that it is not important to have access to the internet in the labor comp.

Figure III-15: Importance of having access to the internet in the labor camp



Non-Users of the Computer Room

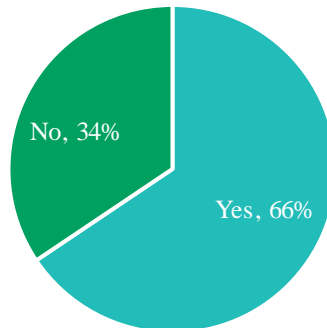
We asked non-users what prevents them from using the computer room at the labor camp. As shown in Table III-5, most reported that they are too busy (50%) or simply do not have the time to use the computer room. Importantly, 25 percent felt that they do not have the computer skills necessary to use the computer room. While little can be done for those that are too busy, more could be done to ensure that workers know that computer skills are not necessary to use the computer room. Indeed, part of the purpose of the Better Connections Program is to help provide these computer skills.

Table III-5: What prevents you from using the Computer Room at your labor camp?

	Non-Users
Don't have computer skills	25%
Not enough machines at the site	7%
The computer room always busy	6%
Poor quality equipment	2%
Slow connection	10%
I'm too busy/just don't have the time	50%
Difficult to gain access to site	1%
Language of the internet content/websites	4%
I can't read/have a low reading level/need help with reading	8%
Other	13%

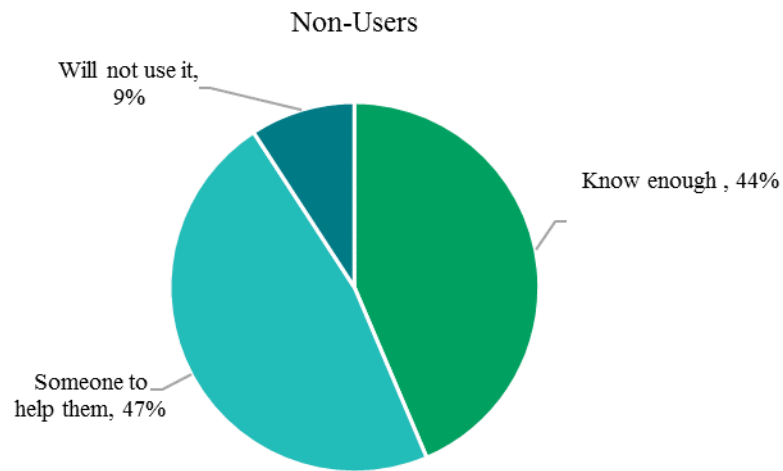
Non-users were asked whether they would, at some point in the future, consider using the Computer room at their labor camps. Encouragingly, two-thirds (66%) of non-users stated that they would consider using the computer room in the future (Figure III-16).

Figure III-16: Consider using the Computer Room at the labor camp in the future.



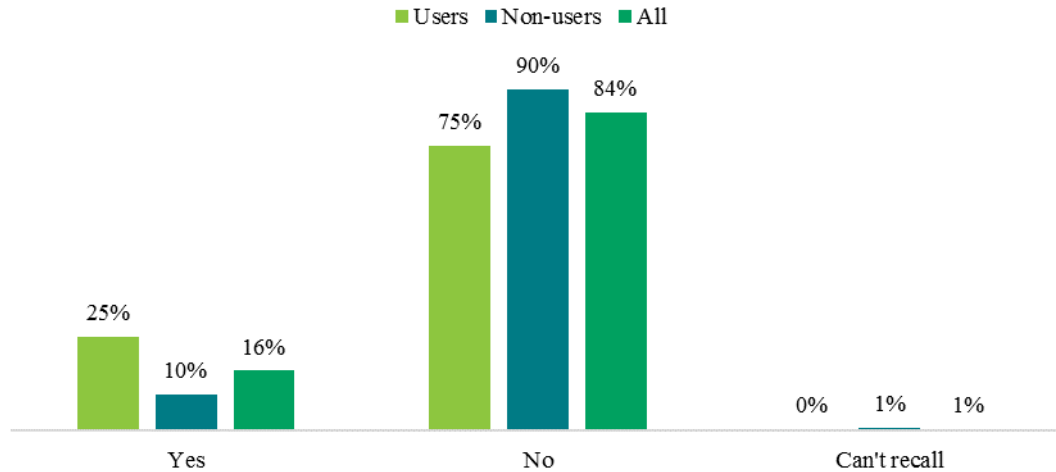
Non-users were asked whether they know enough about computer technology to use the ICT room at their labor camp on their own. The results are reported in Figure III-17. A slight majority (47%) reported needing someone to help them if they were to use it, but only slightly less (44%) reported that they know enough currently to utilize the computer room on their own.

Figure III-17: What is needed to use the Computer Room?



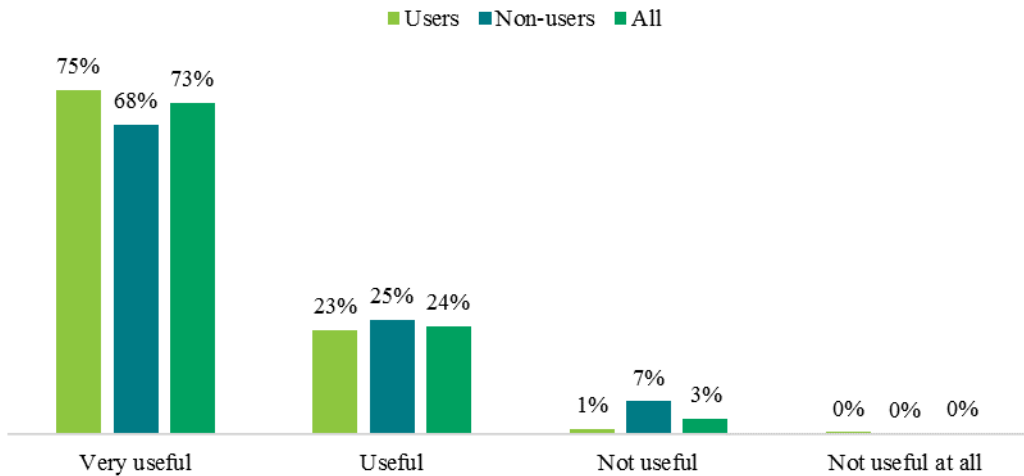
All respondents, users and non-users of the Computer room, were asked whether they have ever participated in any computer program at their labor camps. Overall, only a minority of all respondents (16%) reported having participated in computer or internet training programs at their labor camps earlier. This proportion was significantly higher (25%) for users than for non-users (10%) (See Figure III-18).

Figure III-18: Have you ever participated in any computer or internet training programs at your labor camp?



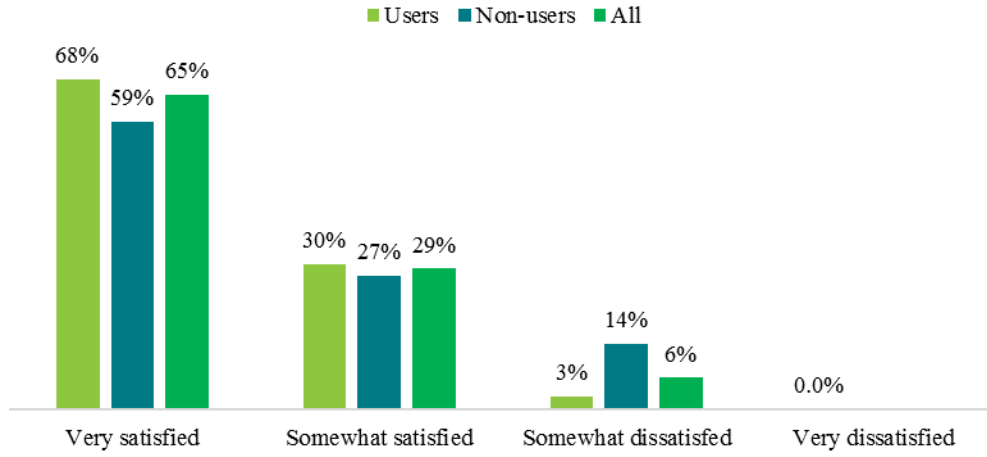
For those respondents who did report having participated in a training program earlier at the camp, the vast majority found it to be either useful or very useful. A significantly higher percentage of users (75%) found the training programs to be very useful as compared to non-users (67%) (See Figure III-19).

Figure III-19: Usefulness of the training programs



Additionally, among those who reported having participated in the computer training programs, the vast majority (94%) reported that they were somewhat or very satisfied with the training, as displayed in Figure III-20.

Figure III-20: Overall, how satisfied were you with the training program(s)?



IV. Barriers and Motivations to Training

Barriers to participation in computer training

To better understand potential barriers to participation in computer and internet training, respondents were asked to indicate for each of the statements listed below in Table IV-1 whether they present a major barrier, somewhat of a barrier or not a barrier at all. Lack of devices after the training to practice their newly acquired skills, as well as timing of the training program were most frequently reported as a major or somewhat of a barrier to training participation. More specifically, respondents who were non-users of their labor camp's respective computer rooms were significantly more likely to report lack of devices (67%) and timing of the program (68%) as a barrier, compared to those respondents who were users (59%).

Table IV-1: Barriers to participation in training

	<i>All</i>	<i>Users</i>	<i>Non-users</i>
	<i>Major and somewhat barrier combined</i>		
Lack of devices after the training to practice my new skills/learning	64%*	59%	67%
Timing of the training program	64%*	59%	68%
No days off from employment for training programs	58%	55%	60%
Reading comprehension	55%*	47%	60%
My reading level	54%*	49%	57%
Language of instruction/language of training content	53%	49%	55%
My confidence in using computers	52%*	41%	59%
Relevance of training programs to me	50%*	46%	53%
A test at the end to show achievement	49%*	45%	53%
Cost of training programs	47%	48%	47%
Location of the training program	47%*	47%	47%
Transportation to the location of the training site	47%*	48%	47%
Employer permission	40%	36%	42%

The asterisk symbol () is used to denote statistically significant differences between users and non-users at the 5% level*

Not having a day off to attend trainings programs was the third most frequently mentioned barrier, reported by more than half of all respondents (58%). It was closely followed by reading comprehension (55%), respondent's reading level (54%), and language of instruction/training content (53%), with non-users reporting them more frequently as barriers, thereby indicating the importance of tailoring the training programs to match the participants' language and comprehension skills.

Likewise, non-users were significantly more likely to report confidence in using computers as a barrier (59% compared to 41% among users), as well as having a test at the end to show achievement (53% compared to 45% among users).

While location of the training program was either a major or somewhat barrier for 47 percent of both user and non-user respondents, it was significantly more likely to be a major barrier for non-users, with 21 percent of them reporting so, compared to 14 percent among users. Similarly, transportation to the location of the training site was significantly more likely to be reported as a major barrier by non-users (22%) compared to users (14%), while overall 47 percent of all respondents mentioned transportation as either a major or somewhat of a barrier. Lastly, having employer's permission to attend a training was mentioned by less than half of all respondents (40%), with non-users reporting it as a major or somewhat of a barrier slightly more frequently (42% compared to 36% among users).

Motivations to participation in computer training

In addition to asking about potential barriers to training, the survey also presented the respondents with a series of statements where they were asked to indicate whether it could be a very important, important or not important potential motivation to their participation in computer and internet training programs.

Free or low-cost access to internet was most frequently mentioned as either very important or important motivation by all respondents (91%), where non-users were significantly more likely to report it as *very* important (58% compared to 42% among users). Similarly, while most respondents (87%) said that gift cards for internet access are either very important or important motivation, non-users were significantly more likely to report so (91% compared to 83% among users). Timing of the training program was third most frequently mentioned, with 90 percent of non-users and 84 percent of users reporting it as an either very important or important motivation (see Table IV-2).

Table IV-2: Motivations to participation in training

	<i>All</i>	<i>Users</i>	<i>Non-users</i>
	<i>Very important and important combined</i>		
Free or low-cost access to the internet made available to me	91%*	87%	93%
Gift cards for internet access	87%*	83%	91%
Timing of the training program	87%	84%	90%
A certificate of attendance	85%	82%	87%
A test at the end to show achievement	84%	82%	86%
Language of instruction/language of training content	81%	77%	84%
The training is relevant to me	81%	79%	82%
Having days off from employment for training programs	80%*	76%	82%
Location of the training program	79%	76%	81%
Loan or low-cost equipment made available to me	79%*	77%	80%
My reading level	78%	74%	80%
Having employer permission	75%*	69%	80%
Reading comprehension	73%*	68%	76%
My confidence level is low	71%*	62%	77%
Cost of training programs	66%	64%	68%

The asterisk symbol () is used to denote statistically significant difference between users and non-users at the 5% level*

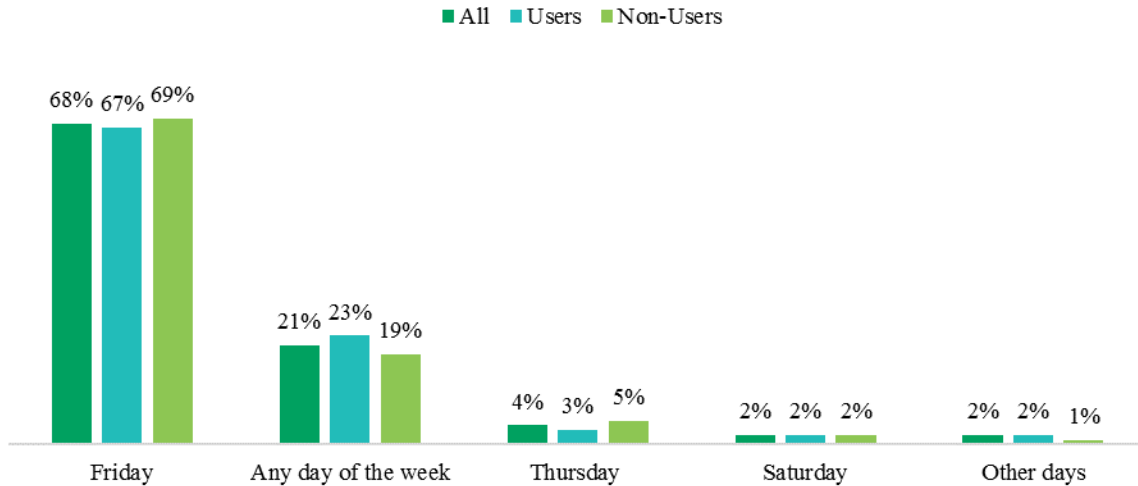
Having a certificate of attendance and a test at the end to show achievement were similarly reported as important motivations by great majority of respondents (85% and 84%, respectively). Receiving the training in the appropriate language of instruction/training content, as well as relevance of the training were respectively reported as either very important or important by 81 percent of all respondents. While having days off for training programs was important for all (80%), non-users were significantly more likely to report that it is *very* important (45%, compared to 37% among users).

Making available loan or low cost equipment was mentioned as either very important or important by 79 percent of all respondents; however, non-users were significantly more likely to report that making available loan or low cost equipment was very important (41%, compared to 31% among users). Having employer permission was significantly more likely to be reported as an important motivation by non-users, with 80 percent of them reporting so, compared to 69 percent of users. Reading comprehension was another motivation considered as important by significantly more non-users (76%) than users (68%); likewise, non-users were significantly more likely to report low confidence level as important. Cost of training programs was least frequently reported as a motivation, with 66 percent of all respondents considering it as either important or very important.

Most suitable time for training

When asked about the most convenient day of week to participate in training, more than two thirds (68%) of all respondents selected Friday, while another 21 percent reported that any day of the week is convenient. Other days of the week were far less popular, with each selected by 2 percent or less respondents (see Figure IV-1).

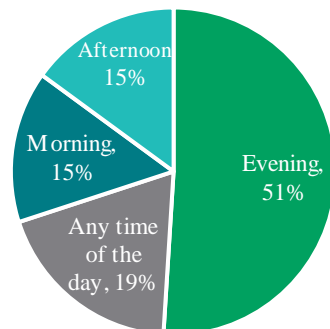
Figure IV-1: Preferred day of the week for training



Most convenient time of the day

The evening was reported by half of all respondents (51%) as most convenient time of the day for training, while another 19 percent reported any time of the day as convenient. Morning and afternoon were each selected by 15 percent of respondents.

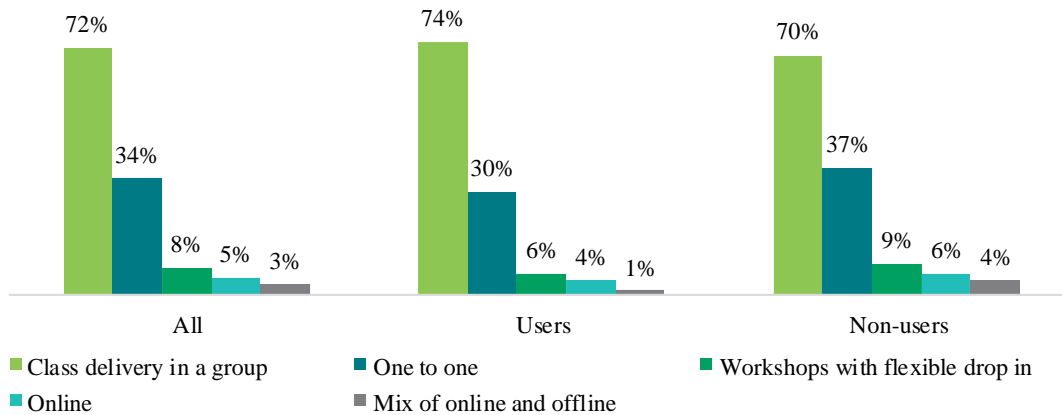
Figure IV-2: Preferred time of the day for training



Type of training format

Respondents were asked to select the formats of training that would encourage them to participate in computer and internet training. Class delivery in a group with a teacher at set times (face-to-face) was most frequently mentioned by all respondents (72%), followed by one to one (teacher to learner) type of training (34% of all respondents) (see Figure IV-3).

Figure IV-3: Preferred type of training format



Elements of training

We also asked the respondents to select elements of training that they consider as most beneficial. Training on using email, basic computer and internet use were selected most frequently, by more than half of all respondents (Table IV-3). Users of the computer room were significantly more likely to select learning a language online, searching for information online, as well as conducting financial transactions as most beneficial elements of training.

Learning about their rights as an employee as well as introduction to life in Qatar were also significantly more likely to be selected by users of the computer rooms. Training on using a digital camera was the least frequently mentioned element by all respondents.

Table IV-3: Most beneficial elements of training

	<i>All</i>	<i>Users</i>	<i>Non-users</i>
	<i>Percent selected</i>		
Using email	65%	66%	63%
Basic computer use or introduction to using a computer	53%	51%	55%
Internet access and use	52%	53%	52%
Learning a language online	42%*	49%	38%
Searching for information online i.e. health, bank, travel	40%*	44%	37%
Financial transactions i.e. online banking	31%*	40%	25%
Social networking (such as Facebook, Twitter)	31%	31%	32%
Job related vocational skills	29%	33%	27%
Your rights as an employee	29%*	34%	25%
Health and safety	26%	28%	25%
Cyber safety and privacy controls	25%	25%	25%
Communication (such as Skype)	22%	24%	20%
Introduction to life in Qatar	21%*	26%	18%
Using a digital camera	20%	21%	20%

The asterisk symbol () is used to denote statistically significant differences between users and non-users at the 5% level*

V. Recommendations

Based on the empirical findings described in this report, this section presents a set of recommendations to enhance the effectiveness of the Ministry of Transportation and Communication's (MOTC) Better Connections Program in Qatar:

Raising Awareness of the Better Connections Program in Qatar

- *Around 92% of users believe that the computer room made them more productive at work*

Based on the results of the survey, it is highly recommended that MOTC implements awareness campaigns for the Better Connections Program among both potential users and donors. Such campaigns are essential to inform employers that the Better Connections Program would increase the productivity of their employees at work.

Raising Awareness of the Computer Rooms at the Labor Camps

- *55% of non-users were not aware of the computer room at their labor camps*

In order to ensure that workers utilize the facilities offered by the Better Connections program, they need to be aware that such facilities exist at their labor camps. It is imperative that the Better Connections Program develops and implements computer room awareness campaigns among blue collars at the labor camps.

Training Workers at the Labor Camps

- *Around 25% of non-users reported that a lack of computer skills was the main reason for not using the computer room*
- *47% of non-users reported needing someone to help them if they were to use the computer room at their labor camp*

Those without any computer skills are apprehensive about using the computer room facilities at their labor camps. Offering training in basic computer skills would remedy this and increase participation of non-users in the Program. Overall, migrant workers residing in labor camps in Qatar are interested in participating in computer and internet training programs. They prefer training programs that are offered at no cost on Friday evenings, and centered around topics of internet access and use of emails. The location of these training programs, a certificate of attendance, and obtaining an employer's permission are critical elements, which would motivate the vast majority of the workers to take part in these training programs.

It is highly recommended that volunteers are available in the computer room to provide help if someone needs it. These volunteers could be the “digital champions” trained by the BC program, as having peers present would motivate workers to use the computer room. It is also crucial that the labor camps facilitate the presence of these digital champions at the computer rooms.

Implementing Better Connections Program at all Labor Camps

- *90% of users reported that the computer room made their life in Qatar easier*

Based on the feedback from the workers, the Better Connections Program plays an important role in aiding transient workers to integrate into a new country and culture. The Ministry of Transportation and Communication (MOTC) and the Ministry of Administrative Development, Labor and Social Affairs (MADLSA) have taken the decision to roll out the Better Connections Program in Spring 2016. We recommend speeding up the rollout and ensuring that the program is inclusive of all labor camps in Qatar.

This would benefit workers in particular and Qatar in general, as the country moves towards building a knowledge-based society, an objective that is in line with the Qatar National Vision 2030.

Providing More Access to the Internet

- *91% of the migrant workers mentioned that free or low-cost access to internet was an important motivation for participating in computer training*
- *63% of the migrant workers indicated that they use the internet to learn and develop their skills*

In addition to the computer room, extending internet connectivity to the entire labor camp will encourage more participation in training programs, and offer opportunities for workers to practice the skills they acquired.

VI. Summary of Methods

Sample design

Sampling is the process of selecting a sample of elements from the sampling frame to conduct a survey. It plays a critical part in any survey process since the ability to make any valid inference to the population, which is the target of the investigation, relies upon a rigorous sample design. In the following, we discuss issues related to the sample design used in this survey.

The first component in the design is the sampling frame. It is a list that can be used to identify all elements of the target population. In this survey, the target population includes people who are 18 years or older and live in one of the 46 camps that have ICT facilities (about 75,000 people). In the frame, all camps are listed with information about the addresses, contact phone numbers, and the number of people and rooms in the camps. Since there are not many camps in the frame and to ensure enough precision in the estimates, we decided to include all camps in the sample. Also, to have self-weighted data, we set the number of people to be selected in each camp to be proportionate to the camp size. However, as the individual characteristics vary more in the small camps than the big camps (based on our previous labor camp surveys), we over-sample in the small camps and under-sample in the big camps. In this way, we can better capture the variation in the target population. This under- and over-sampling is considered in calculating the data weights.

In each camp, there are two type of respondents: users and non-users of the facility provided by the Better Connections Program. The former includes all people in the camp who used the facility and have been registered in the log file. The latter consist of those who did not use the facility. For this group, the selection of respondents was conducted in two stages. First, we select the rooms in each camp with circular systematic sampling. The basic idea of systematic sampling is to select rooms by taking every k th unit in the camp, where k is called the sampling step which is the whole number part of the ratio between the camp size and the number of people to be interviewed. As labor migrants from the same country tend to live in adjacent rooms, the selection of rooms by systematic method helps to reduce the chance of selecting people from one country, and hence increases the variation in sampled people's characteristics. In the second stage, one bed in each room is randomly selected and the person using that bed is interviewed. Since the information about the location of rooms and identity of people in the camp is not available in the frame, the selection of rooms and the person inside the room are conducted during the field work in two separate visits as follows.

First, a supervisor (with a computer) is sent to the selected camp. Upon arrival, he asks for the number of rooms in the camp and then the computer (using above circular systematic sampling) shows him the room numbers to be selected. Since there is usually no room number in the camp, the supervisor is instructed to number rooms from left to right and start at the room closest to the camp gate. After the computer identifies the rooms, the supervisor asks for the number of people living inside the selected rooms and then computer randomly selects one person.¹ Also, the supervisor asks for the language spoken by the selected person. The supervisor then leaves the camp without interviewing the selected person. Before leaving, he puts a sticker on the door of selected rooms.

Second, interviewer(s) with suitable language is (are) assigned to visit the camp to conduct the interview with selected persons in the camp. The interviewers can locate the selected rooms in the camp with the stickers and then conduct the interview with the person in the room who has already been selected by the supervisor.

The main reason for the two visits to the camp (one by the supervisor and one by the interviewer) is to solve the issue of differences in spoken languages. Labor migrants in the camp usually originate from many countries and speak different languages. Without information about the language of the selected persons, it is not possible to send an interviewer to the camp who speaks the correct language. The quality of the data could be hampered if interviewers and respondents do not fully understand each other due to language differences. Another reason for the two visits is related to gate keepers at the camp. Having a supervisor, who is well trained, dress and speak well, is sometimes necessary to gain access through persons who control access to the camp. Overall, the two visits increase the field cost, but are needed to ensure survey data quality.

Questionnaire development

The questionnaire is designed to collect all necessary information related to the study. In collaboration with the Better Connections Program, the questions were initially designed in English and then translated into other languages (e.g., Arabic Urdu, Tagalog) by professional translators. After, the translated versions of the instrument were carefully checked by researchers who are fluent in both English and the other languages. Next, the questionnaire was tested internally inside SESRI. This allowed the project team to learn whether respondents could understand and answer the questions, as well as to identify important concerns that affected responses to the questions.

¹ If the number of rooms is less than the number of people to be sampled, the supervisor can select 2 persons in the room.

After making necessary changes to the questionnaire based on this internal pre-test, the survey was programmed into CAPI (Computer Assisted Personal Interview) system using the software BLAISE. After debugging the program, a face-to-face pre-test on a small number of participants was conducted. This pretest gave valuable information to refine question wording, response categories, introductions, transitions, interviewer instructions, and interview length. Based on this information, the final version of the questionnaire was created and then programmed into CAPI for the fieldwork.

Survey Administration

The survey was administered in CAPI (Computer Assisted Personal Interview) mode. CAPI is a computer assisted data collection method for replacing paper-and-pen methods of survey data collection and usually conducted at the home or business of the respondent using a portable personal computer such as a notebook/laptop.

Each interviewer received an orientation to the CAPI system, participated in a training program covering fundamentals of CAPI interviewing and standards protocols for administering survey instruments, and practice time on the computers (laptops). During the period of data collection, the management used a monitoring system to ensure that questions were asked appropriately and the answers were recorded accurately.

SESRI is strongly committed to the idea that knowledge of interviewing techniques and field procedures should be supplemented with the basics of survey research to reinforce the necessity for quality data collection. This includes an on-going interviewer training, a strong interviewer support during the field production, and an important monitoring system and equipment that allow supervisors to monitor and evaluate interviewer activities.

Data Management

After the data collection, all individual interviews were merged and saved in a single BLAISE data file. This dataset was then cleaned, coded and saved in STATA formats for analysis. After weighting the final responses to adjust for probability of selection and non-response, the data were analyzed using STATA, the statistical software for the social sciences. Both univariate, bivariate and multivariate analyses were performed.