

# Impact of restricting access to health care services on Syrian refugees in Jordan: evidence from cross-sectional surveys

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## Abstract

*Purpose – Access to health-care services for refugees are always impacted by many factors and strongly associated with population profile, nature of crisis and capacities of hosting countries. Throughout refugee's crisis, the Jordanian Government has adopted several healthcare access policies to meet the health needs of Syrian refugees while maintaining the stability of the health-care system. The adopted health-care provision policies ranged from enabling to restricting and from affordable to unaffordable. The purpose of this paper is to identify the influence of restricted level of access to essential health services among Syrian refugees in Jordan.*

*Design/methodology/approach – This paper used findings of a cross-sectional surveys conducted over urban Syrian refugees in Jordan in 2017 and 2018 over two different health-care access policies. The first were inclusive and affordable, whereas the other considered very restricting policy owing to high inflation in health-care cost. Access indicators from four main thematic areas were selected including maternal health, family planning, child health and monthly access of household. A comparison between both years' access indicators was conducted to understand access barriers and its impact.*

*Findings – The comparison between findings of both surveys shows a sudden shift in health-care access and utilization behaviors with increased barriers level thus increased health vulnerabilities. Additionally, the finding during implementation of restricted access policy proves the tendency among some refugees groups to adopt negative adaptation strategies to reduce health-care cost. The participants shifted to use a fragmented health-care, reduced or delayed care seeking and use drugs irrationally weather by self-medication or reduce drug intake.*

*Originality/value – Understanding access barriers to health services and its negative short-term and long-term impact on refugees' health status as well as the extended risks to the host communities will help states that hosting refugees building rational access policy to protect whole community and save public health gains during and post crisis. Additionally, it will support donors to better mobilize resources according to the needs while the humanitarian actors and service providers will better contribute to the public health stability during refugee's crisis.*

**Keywords** *Impact, Restrictions, Access to health, Syrian refugees*

**Paper type** *Technical paper*

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## 1. Background

With the ongoing conflict in Syrian Arab Republic (aka Syria), the Syrian crisis enters its 10th year of life. It is considered the greatest tragedy of the 21st century and the worst refugee crisis since Second World War (Guterres, 2012). The increasing number of refugees from Syria across the Middle Eastern region and worldwide continues and the demand for a large-scale sustainable response remains to adequately address the needs of refugees in the host communities. By the end of February 2020, more than 5.56 million Syrian refugees were registered with United Nation High Commissioner for Refugees (UNHCR), including

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refugees hosted in Turkey, Iraq, Jordan, Lebanon and Egypt (United Nation High Commissioner for Refugees [UNHCR], 2020).

Jordan has been one of the most affected countries where more than 656,000 Syrians fled across the border to establish their new life. The vast majority of them (81.1%) settled in major urban settings across the country while only 18.9% were settled by the United Nations into two main camps (United Nation High Commissioner for Refugees [UNHCR], 2020).

### *1.1 Overview of health services and access policy for Syrian refugees in Jordan*

Health is considered one of the basic human rights where everyone should have affordable and adequate access to health-care services wherever and whenever needed (World Health Organization, 2016). Based on lessons learnt from previous crises where mutual benefits were gained due to granting refugees and asylum seekers access to health services (Thiel de Bocanegra *et al.*, 2018), the GoJ passed policies permitting UNHCR registered Syrian refugees to access essential health-care services provided by the Jordanian Ministry of Health's (MoH). This included accessing primary health-care centers (PHCs) and MoH hospitals. Nevertheless, this access policy changes from time to time. For instance, in March 2012 GoJ allowed urban registered Syrian refugees to access MoH services free of charge; this access policy remained active until November 2014. After then, the GoJ stopped offering free access to health services, and instead, Syrian refugees were asked to pay the non-insured Jordanian rate (subsidized rate used for average Jordanians who do not have civil insurance). However, in February 2018 this policy was also withdrawn and Syrian refugees were required to pay the 80% of foreigner rate (inflated rate from 2 to 5 times of subsidized rate) (United Nation High Commissioner for Refugees (UNHCR), 2018b) when accessing any type of health service provided by MoH. Finally, in March 2019 the GoJ decided again to grant subsidies for Syrian refugees living in urban setting with access at a non-insured Jordanian rate again. However, throughout these fluctuations the GoJ maintained important exceptions and guaranteed free access to preventive antenatal care, family planning and all expanded program on immunization (EPI) to children and pregnant women.

### *1.2 Barriers to health care among refugees*

Because of emergency eruptions, unpredictability then sustainability of refugee situations worldwide the hosting communities, states, donors and international organizations were very focused to understand the health access, utilization trends and population needs, structure the health services interventions and predict public health risks to the host communities.

Refugee population have special issues due to increased health-care needs and vulnerabilities combined with long-lasting instability and lack of resources (Schneider *et al.*, 2015) – that is why there are many access barriers been identified by researchers. For instance, Mangrio *et al.* (2018) in their mixed method research found that cost, long waiting and language are the main barriers to get health care. Furthermore, health awareness, knowledge of rights, legal status and cost were other barriers pointed out by other researchers (Chuah *et al.*, 2018). Many other studies explore other barriers including: transportation, gender sensitivity, lack of confidence, discrimination and lack of special, tailored services (Guruge *et al.*, 2018; Kohlenberger *et al.*, 2019; Correa-Velez *et al.*, 2005). Finally, with multiplications of barriers detected by literature, findings by Antonipillai *et al.* (2017), brought more clarity within the area of refugee health that enabling us to better understand those factors when they classified them into four main barriers: cognitive barriers, structural barriers, socio-political barriers and financial barriers.

### *1.3 Cost as a specific factor*

The availability of health services, or the absence of many specific barriers such as language, culture, perceptions or even flexible policies does not necessarily mean that the

services are affordable (World Health Organization, 2010). Affordability of care cost stays a major factor. Hence, the availability of health services coverages through insurance or waivers could have positive impact on health status stability among refugee community (Langlois *et al.*, 2016).

Cost to access health services has been found as a main barrier specific to refugees compared to host communities or even to other types of migrants (McKeary and Newbold, 2010). Additionally, the increased cost of seeking medical care due to limited access policies that had been adopted by several countries (Norredam *et al.*, 2006) clearly lead to the reduction of refugees' capability to seek needed health services timely (Al-Rousan *et al.*, 2018). On the other hand, the availability of health insurance, waivers or other types of health coverages had shown to have direct positive impact on health-care access level and eliminated cost as a barrier to get health services (Kohlenberger *et al.*, 2019) and (Guruge *et al.*, 2018).

Reference to the current access policy, Syrian refugees have the same level of access to the average Jordanian. In theory this may suggest that refugees have more or less the same utilization behaviors thus have almost the same gains by accessing the same package of health services. However, this cannot be the case when considering refugees' community potentials or vulnerabilities and their ability to meet their several needs other than health. A vulnerabilities detection survey conducted by UNHCR in 2018 showed that 78% of Syrian refugees were found to be severely or highly vulnerable based on their welfare score. The same survey found that almost half of refugees are highly or severely vulnerable in regards of their health status (United Nation High Commissioner for Refugees (UNHCR), 2019a). Other health access and utilization surveys conducted by UNHCR in 2017 and in 2018 (United Nation High Commissioner for Refugees [UNHCR], 2018a, 2019 b) showed that Syrian refugees are suffering from increase of health-care cost. Only 27% firstly accessed the subsidized public health services in 2017, and this percentage was reduced to 14% in 2018.

Healthcare utilization defined as, the quantification or description of the use of services by persons for the purpose of preventing and curing health problems, promoting maintenance of health and well-being, or obtaining information about one's health status and prognosis (Carrasquillo, 2013). However, understanding health utilization behaviors and barriers to get health care are essential, but what is beyond that? When the immigrant and/or displaced population find themselves in a protracted crisis with limited access to critical health services they might turn to adopt new strategies to meet their basic health needs and minimize the impact of care barriers. A qualitative study conducted in US among Korean immigrants found that due to access barriers, the population adopted new health seeking behaviors to meet their health needs, behaviors included delay in seeking care, reduced use of preventive care, self-diagnosis and treatment and more access emergency oriented care (Choi, 2013).

## 2. Materials and methods

This paper uses information from UNHCR's Health Access and Utilization Survey [HAUS, 2017] (United Nation High Commissioner for Refugees [UNHCR], 2018a) and UNHCR's Health Access and Utilization Survey [HAUS, 2018] (United Nation High Commissioner for Refugees [UNHCR], 2019 b) that were conducted among urban Syrian refugees in Jordan in 2017 and 2018.

HAUS is a global tool used by UNHCR since 2014 to monitor the health status of refugees and understand operational challenges to structure programs in several operations accordingly. HAUS is a 50 plus set of close ended questions uses a well-defined context-driven Likert scale consume 10–15 min, captures the data in seven main thematic areas including sociodemographic variables, knowledge of available health services, child vaccination, antenatal care and family planning, chronic disease, disability or impairment and monthly health access assessment. In both years, UNHCR Jordan recruited a consultant company to conduct the surveys. The consultants followed up on standard

quality control procedures throughout the consultancy including pre-field procedures (process of obtaining ethical approvals from Health Sector Ethical Committee and MoH, pretesting of survey tool and selection and training of enumerators), during field procedures (piloting and professional supervision) and during post field (data processing, data cleaning and security). Finally, survey sample was around 400 households in both years (sample size calculation for cross sectional surveys used to calculate sample size, type one error was at 5% with  $p$ -value < 0.05) and selected through UNHCR registration data base using simple random technique with additional substitute sample.

Data were quantitatively collected through telephone interviews with adult household member using Computer Aided Telephonic Interviews (CATI) through QPSMR Software in 2017, while in 2018, data were collected through open data kit (ODK) using Kobo application. Survey participant inclusion criteria was any adult above 18 years old who is a head of household, or a care giver with enough knowledge on family health profile regardless gender. Consent was obtained from participants verbally and recorded on soft copy of survey form.

A quantitative comparison used frequencies of key health indicators reported in both years under the main immediately impacted thematic areas (maternal health, family planning, child health and monthly access of household) to identify impact of restricting access to health service over different access policies. The descriptive data used to compare access indicators over abovementioned themes, the key indicators selected aim to compare and contrast between health services utilization trend and encountered barriers for those group of services maintained on free access basis and those were impacted by increased health-care cost due to introduction of new access policy.

An approval granted from UNHCR Jordan representation to use only survey reports findings without access to the database. The chronic diseases and disability findings were excluded due to impact measurement limitations as a result of limited delivery through public health-care system and the long term nature of medical condition that require longer time frame to have real impact on health status of beneficiaries.

Table 1 summarizes the main inputs of UNHCR's HAUS surveys in 2017 and 2018.

### 2.1 How HAUS findings will be used to measure impact of restricting access to health services on refugee health?

HAUS was a regular annual practice for UNHCR Jordan since 2014 and normally the data collection phase take place toward the end of each year. As mentioned earlier, the GoJ granted Syrian refugees living in urban setting with the same access to all packages of health services provided by the public health system as Jordanian citizens who are not covered by the national insurance scheme (Non Insured Rate [NIR]). The NIR was considered a highly subsidized rate in Jordan, and UNHCR considered this rate affordable for most of refugees (United Nation High Commissioner for Refugees (UNHCR), 2015). During the implementation of this access policy, UNHCR continued monitoring the refugee's access and utilization to health services through HAUS and specifically from 2014 until 2017. While this practice maintained during those years

Table 1 2017 and 2018 main inputs		
Inputs	HAUS 2017	HAUS 2018
Data collection timeframe	December 2017	December 2018
Sampling technique	Simple random	Simple random
Sample size	400 HH/2,422 members	400 HH/ 2,075 members
Data collection technique	Telephone by CATI	Telephone by ODK\Kobo application
Access policy	NIR (Subsidized rate)	80% of FR (High cost rate)

Notes: <sup>a</sup>NIR: Non Insured Rate. FR: Foreigner Rate  
Source: HAUS report, 2017-2018

the government of Jordan decided right after completion of 2017 survey and specifically on early February 2018 to change access policy to the Foreigner Rate (FR) minus 20% with no changes on other access eligibilities including geographical existence or documentation status. However, UNHCR considered this a huge inflation in health-care cost for Syrian refugees and estimated the increase in health-care cost at range of 2 to 5 times compared to NIR which will cause a considerable hardship for all refugees (United Nation High Commissioner for Refugees [UNHCR], 2018b). Later in 2018 and after 10 months of new access policy implementation UNHCR had repeated the HAUS to monitor the impact of new access policy where a considerable shift noticed in many access indicators.

This review paper will use this exceptional opportunity where an isolated impact factor (increase of health-care cost) found co accidentally in a protracted refuge situation to better understand the impact of restricting access to health care among urban refugees.

This research paper will focus on short-term impact using descriptive analysis for main health-care aspects including maternal (ANC, delivery services and family planning), child health (immunization) and monthly access assessment to estimate the impact.

### 3. Results

#### 3.1 Population characteristics

The general population characteristics show minimal differences between 2017 and 2018 findings. For instance, in both surveys almost 81% of interviewed members were the head of household (HH). The distribution of population based on the residing governorate was almost the same among both with less than 3% variations. Male/female gender distribution was the same at 49% vs 51% in both years. There were some differences in age distribution where a slight decrease by 2% was found in the proportion of children and a slight increase in those above age of 60. Significant changes found on the average size of HH where it decreased from 6 persons to 5.2 persons in 2018. Additionally a significant decrease from 42% to 17% was found in the proportion of women at reproductive age who were found pregnant prior to survey. Finally, a very significant increase in the proportion of female HH was found in 2018 compared to 2017.

Table 2 shows main population characteristic findings in both surveys.

Variable	2017	2018
Total HH members	2,422 individuals	2,075 individuals
Average size of HH	6.00	5.20
Female proportion	51%	51%
Proportion of married	37%	35.20%
Proportion of single	54%	59.90%
Proportion of children (less 18)	51%	49%
Proportion of over 60 years	3%	5%
Proportion of female headed HH	13%	34.20%
Proportion of HH with proper documents (MOI card)	96.80%	97%
Pregnant proportion among WRA <sup>a</sup>	40% (N = 494)	17% (N = 923)
Proportion of members with chronic condition	15%	15%
Average no. of children eligible for vaccination	2	2

Note: <sup>a</sup>WRA: Women at reproductive age  
Source: HAUS report 2018

### 3.2 Maternal health

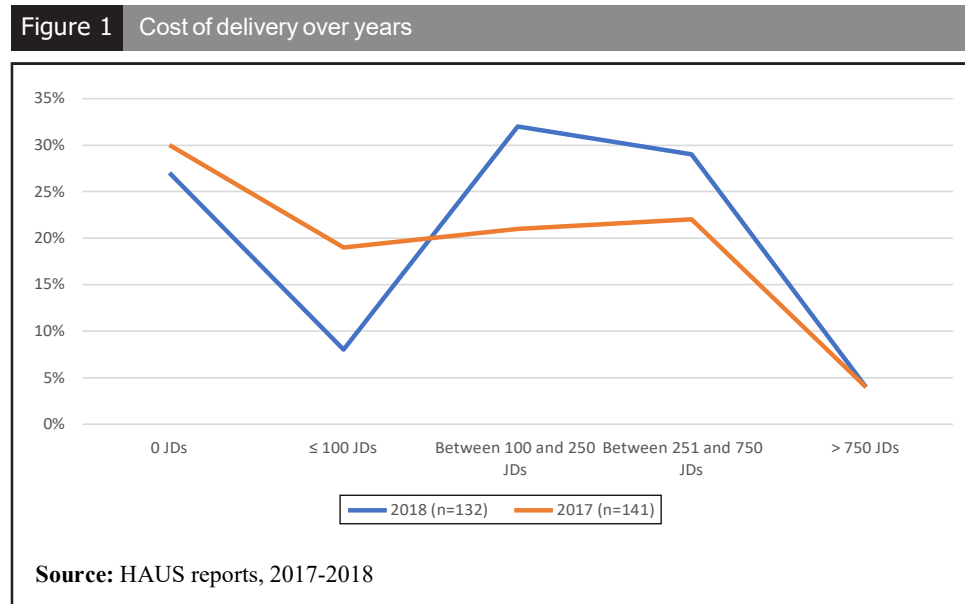
**3.2.1 Antenatal care.** The result of antenatal care (ANC) assessment shows an improvement in main access indicators where 90% of women who needed ANC were able to access. Only 16% ( $n = 22$ ) reported difficulties in accessing ANC and affordability of cost was the most reported difficulty. The full antenatal coverage (four or more visits) improved in 2018 compared to 2017 (Table 3) with increase in those who reported cost of care as a main barrier to get services.

**3.2.2 Delivery services.** Safe delivery services were greatly impacted with a huge discrepancy in findings. For example, the proportion of delivery through Cesarean section (CS) decreased from 33% to 29%, while the proportion of those who decide to deliver in public hospital reduced from 53% to 48%. Furthermore, the proportion of those who decided to deliver in private facilities increased from 43% to 46%. However, the cost of delivery among those who delivered a live baby ( $N = 132$ ) witnessed a significant increase (see line Figure 1) over years.

**3.2.3 Family planning.** The findings of 2018 survey showed improvement in level of awareness on availability of family planning methods where it increased from 48% to 57% among household. A significant increase was noticed (56% in 2017 to 70% in 2018) in those who acquire information on family planning. Regarding accessing contraceptives, the most frequently accessed source was the public health centers in both 2017 and 2018 surveys (36%). A significant decrease by 14% was observed in accessing contraceptives from NGOs and private clinics and a significant increase in accessing other sources was observed by 31%.

Table 3 ANC coverage		
# of ANC visits	2017 (n = 172) (%)	2018 (n = 137) (%)
1-2 ANC visits	23	7.3
3-4 ANC visits	24	24.8
> 4 ANC visits	53	67.9

Note: <sup>a</sup>MMR: Mumps, Measles and Rubella  
Source: HAUS report 2018



### 3.3 Child health (immunization)

Immunization assessment indicators shows improvement over years with zero difficulties encountered among families in 2018. The awareness level, immunization coverages and documentation levels have improved from 4% to 7% between 2017 and 2018 and public health-care centers stay the first place to obtain vaccines (Table 4).

### 3.4 Monthly access assessment

The monthly access assessment is meant to assess family health needs and encountered health events in a month prior to the survey. This information was used by UNHCR to capture real and time specific health seeking among target group to enhance data validity and eliminate poor recall effect.

The findings from monthly assessments over 2017 and 2018 shows significant changes in all aspects of monthly assessments. For instance 49% ( $N = 923$ ) of survey population needed health care in the past month among 2018 cohort compared to 37% ( $N = 905$ ) in 2017. Those who sought care in 2018 were significantly less (45%,  $N = 425$ ) than those in 2017 (77%,  $N = 697$ ).

The other greatly impacted area was the decision by refugees about where to go firstly to seek health care. The surveys showed a significant decrease in the number of refugees who firstly seek care at public health facilities (from 27% in 2017 to 14% in 2018) as well as the private health-care facilities (23% in 2017 to 15% in 2018). While a significant increase found in those who seek services through NGOs supported services (18% in 2017 to 35% in 2018) and those who access over counter medication through private pharmacies (22% in 2017 to 37% in 2018). However, those who reported money expenses on health were almost the same in 2017 as in 2018 at 79% and 78%, respectively, but a significant increase in health-care cost at first accessed facility reported from 30.5 JDs in 2017 to 47 JDs in 2018. Finally, no notable differences found in monthly expenses on health between 2017 and 2018 where most of the families spent 99.8 and 98 JDs, respectively.

## 4. Discussion

Results from the 2017 and 2018 HAUS clearly reflect the impact of health-care cost inflation where cost increased from 2 to 5 times in short period of time as per UNHCR's estimations (United Nation High Commissioner for Refugees [UNHCR], 2018b). Additionally, there is a clear contrast between findings among group of services that continue to be provided on free access basis and those were impacted by policy changes.

The refugees' access to the group of services that have been maintained on free of charge basis included preventive ANC care, family planning and immunization services have not been impacted negatively rather they improved in terms of access indicators. For instance, 90% of pregnant women received ANC care during pregnancy in 2018 compared 88% in 2017 while the full ANC coverage increased from 53% to 67.9%. Family planning indicators showed an improvement in awareness and knowledge levels but less people tried to obtain services due to cost of transportation. Thus those who were seeking services from other sources (over counter

Table 4 Summary of immunization assessment

Vaccination indicator	2017 (n = 215) (%)	2018 (n = 304) (%)
Aware of free children vaccination	93	97
Had a vaccination card	90	97
Polio coverage	93	97
MMR <sup>a</sup> coverage	90	96
Received vaccine at public health center	95	96

Source: HAUS report 2018

medications) increased significantly from 5% to 36%. Again, the immunization indicators including awareness and coverages for main vaccines (Polio and MMR) have slightly improved (Table 4) where public health-care centers stayed the main source for vaccination seekers. In conclusion, we can confidently say that maintaining free access policy would positively impact health-care uptake behaviors and might reasoning the slight improvements recorded in the free access group to the improvement of awareness level and elimination of some documentation barriers (Table 1).

It was always recommended to maintain reproductive health services at an affordable cost for refugees to minimize maternal complications among vulnerable women (Sweileh, 2018). This supported by these surveys and other research findings (Kohlenberger *et al.*, 2019) which little groups reported unmet health needs once free access to the services granted. However, there is a concern related to fragmentation of care and lack of continuity that could be a barrier to access health services and may have negative impact on long term (Van Loenen *et al.*, 2018).

On the other hand, there was a clear impact for health-care cost inflation on the groups who accessed services on the new access policy. For example, due to the increase in cost of delivery in public hospital there were a shift in utilization of delivery services from public hospitals to the private hospitals. Furthermore, the interesting finding was the decreased proportion of CS delivery where the cost increase maybe the reason behind some HH decision to avoid optional costly CS in comparison to normal vaginal delivery.

Looking more deeply into the findings of monthly access assessment as a major predictor in seeking behaviors we can clearly detect the impact of increase cost on those who increasingly need services but were less active in seeking care and left their needs unmet. These findings have been supported by UNHCR 2018 survey findings when those confirmed the increase in health-care cost ( $N = 397$ ) reported inability to visit doctor or hospital when needed (28%), cannot afford medication (42%) or cannot afford other medical procedures (29%) as the major impact for cost increase. Nonetheless, the cost increase in some groups resulted in the shifting of health services seeking behavior toward using NGOs free supported services rather than public health services. Another alerting finding was the increase of those who were seeking treatment through accessing down street pharmacies to obtain medication without proper assessment nor diagnosis as a strategy to decrease health-care cost.

With clear evidence of health-care cost increase reported by the survey findings as a result of new access policy implementation there were almost no impact on HH monthly expenditure on health before and after implementation of new access policy. However, to understand the absence of such impact we review a new additional information that been collected by UNHCR in 2018 survey only (Table 5) where a group of respondent asked to report their adaptation strategies to meet their health needs with this sudden increase in cost. Almost two-thirds of impacted individuals reported use of free services and reduced health-care demands (reduction in provider visits or medication use) which are strongly reasoning the stability of HH monthly expenditures on health.

However, an alerting indicator revealed from this analysis are the risky strategies adopted by the refugee community to minimize the impact of health-care cost inflation on their

**Table 5** Strategies adopted by refugees to decrease impact of health-care cost increase

<i>Adaptation strategies</i>	<i>2018 (n = 563) (%)</i>
<i>No coping strategy adopted</i>	26
<i>Sought for NGO free services</i>	21
<i>Reducing number of visit to health-care providers</i>	27
<i>Reduce or stop medication use</i>	16
<i>Spent saving or borrow money</i>	10

Source: HAUS report, 2018



capacity to meet their health needs. There are three dangerous behaviors detected including fragmented seeking behaviors, reduction or delay in visits to health provider when needed and an irrational drug use (over utilization through self-medication or underutilization through reducing or stopping medication use).

First, the fragmented seeking behaviors take place when refugees have a limited package of services (Norredam *et al.*, 2006). Then, refugees start seeking certain levels of services from different providers to reduce cost of health care. For example, in terms of maternal care, in our case women start seeking ANC through the public system because they are free of charge. Some group of women will shift to using a private provider for safe delivery as a more cost effective option and later shift back again to public health-care system seeking free postnatal care – including family planning and newborn vaccination. This kind of seeking behavior is considered fragmented. Fragmented health services, incomplete medical history and the lack of continuity in care is defined as a barrier to care (Van Loenen *et al.*, 2018), as it might negatively impact the mainstreaming of refugees health needs into a standing public health-care system and bring more health risks to the target population.

Second, health-care needs is not the only needs the refugees have to meet, there are many other livelihoods needs that limit their ability to obtain needed health services (Chuah *et al.*, 2018). Most of the time, this obliges them to prioritize other urgent needs over health. The risk of not seeking or delayed seeking of health care expected to impact refugees health on short and long term (Morris *et al.*, 2009), it is well-founded that poor access and delays in seeking care will result in the development of preventable complications (Frontieres, 2013; World Health Organization, 2015). While contacting health-care provider as soon as possible will reduce health risks, prevent costly complications and increase cost effectiveness of health services (Wal, 2015).

Finally, the irrational drug use has been detected as a separate impact for restricting access to comprehensive health care among refugees community. The irrational drug use through self-medication is found to be common in some countries and have shown an extended risk to community members as whole by escalating antibiotic resistance in host communities and worldwide (Priyadharsini, 2019). On the other hand, the underutilization of justified drugs will have negative impact especially for those with chronic conditions who might develop complications that negatively impact their quality of life and transfer them to a higher costly level of care (Daynes, 2016).

## 5. Limitations

In this review various, inevitable limitation was detected. First, while the data collection method was through reaching the target population via telephone, there were many invalid phone numbers leading to high attrition rates. Furthermore, data collected highly relied on respondent willingness and memory to disclose information on household members leaving a chance to favoritism. Second, the researchers were only able to access survey reports with no access to actual database and thus limiting access to additional descriptive data or bivariate analysis. However, additional research is recommended using a comparative study among those with affordable access to health care and those with limited access to find out direct impact of restricting access to the health while using mixed method may bring more understanding for the hidden impact on other means of livelihood among marginalized population.

## 6. Conclusion

Limiting health-care access to refugees in hosting countries is still practiced in many countries due to many reasons (Norredam *et al.*, 2006). One of the major standing barriers that limit access to health services among refugees worldwide is the increased health-care cost. This analysis between two surveys conducted among the same refugee population in Jordan who were impacted by limiting their access to health services using isolated factor (increase cost of care)

had similar findings as many previous studies (Hadjkiss and Renzaho, 2014). Additionally, it has proved that the limited access by cost has resulted in a negative impact on refugees' health as well as the development of negative adaptation strategies by refugees (Chuah *et al.*, 2018) and might increase per capita expenditure compared to those with regular access to care (Bozorgmehr and Razum, 2015). Finally, the restricted access to health care and negative adaptation strategies may worsen the medical condition among refugees and bring more to emergency situations (Kiss *et al.*, 2013). On the other hand, the improved access to displaced with focus on preventive health care rather than emergency conditions will reduce the expenditure on health care with better outcome on whole population health status (Nandi *et al.*, 2009).

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