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MEDAL Facility Report

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The Jordan Payments and Clearing Company

Medal Facility Report

March 2022

Amman, Jordan

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MEDAL Facility Report

Acknowledgements

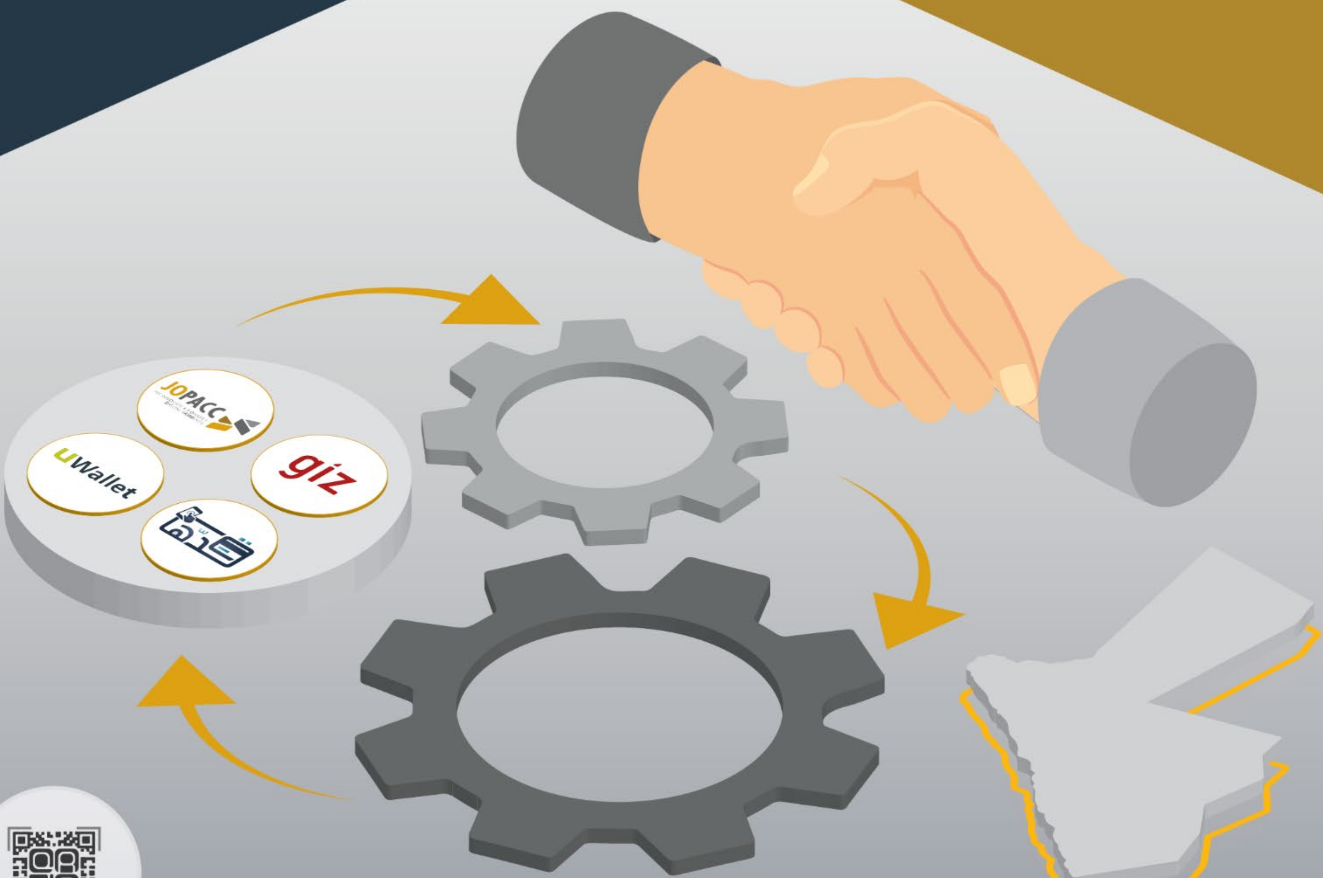
The success of the MEDAL Facility was the combined effort of all partners involvedJoPACC would like to sincerely express its gratitude for the German Federal Ministry for Economic Cooperation and Development (BMZ) for funding the project, as well as for Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH for the implementation of the project and the support provided for its design and conceptualization. Furthermore, JoPACC would like to thank Alhulool (UWallet) and Gate to Pay (Gadha wallet) for their perseverance, agility, innovation, and commitment towards learning and taking risks in fulfilment of national policy objectives and developmental goal. The benefits of this facility would not have been possible without their hard work.

Executive Summary

Mobile money in Jordan has recently risen in prominence especially given the national reliance on it as a means of digital transfers and payments during COVID-19. That being said, sustained usage which persists after the end of the pandemic requires pervasive and prevalent usage opportunities to avoid reliance on cash-outs. This can be described as digital liquidity, whereby users of a given digital financial instrument are able to utilize value stored within these instruments digitally, without having to convert it to paper-based money. As such, Jordan Payments and Clearing Company (JoPACC) and the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH, partnered up to launch the Merchant Expansion through Digital Acceptance and Liquidity (MEDAL) Facility. Through a tendering process, this Facility aimed to financially support two mPSPs to meet certain merchant acquisition and QR-code transaction targets by experimenting with and developing business, operational, and awareness strategies. Both selected mPSPs were able to meet all targets stipulated in the Facility. Furthermore, usage of QR-codes for payments increased substantially especially amongst new user segments. Overall, the results of the facility indicate a successful intervention which represents a valuable learning opportunity for other mPSPs both within and outside Jordan.

1

Introduction



Introduction

A relatively small nation within the region of West Asia, Jordan is renowned for its stability and resilience despite various regional and global events of political, social, and economic turbulence. In fact, its openness and high sense of moral responsibility in navigating the challenging journey towards national economic prosperity has reshaped the fabric of Jordanian society and redefined the sense of patriotic sentiment within the nation to that of camaraderie, adaptability, and perseverance. With that in mind, its leadership has sought out to conceptualize and implement strategies that are fitting of this renewed sentiment rallying the country. One such example of this is The Jordan 2025 National Vision and Strategy, which established various milestones of importance to build the Jordan of the future. One such milestone is a sustainable developed Jordanian economy, which relied on competitive and model financial infrastructure that is ubiquitously accessible and reliable.

Jordan is a lower-middle income[1] country with a population size of 10.8 million residents, 47% of which are women and 53% men[2]. Jordan's population is highly urbanized, where 91% of the population live in urbanized zones[3]. Amman, its capital city, takes the lion share where it houses 42% of Jordan's population, followed by Irbid and Zarka (18.2% and 14.3% respectively)[2]. Furthermore, Jordan is home to a largely young population, where 44.3% are below the age of 19, and 39% are between 20-44[2]. It also hosts a large number of migrants and forcibly displaced people, where Jordanians make up around 69% of the population and non-Jordanians make up 31%[3].

The 2017 release of the Global Findex Database, the world's most comprehensive data set on access to and usage of financial services, reported that only 42% of adults in Jordan had access to an account at a formal financial institution[4]. Access to accounts at formal financial institutions is a telling proxy of overall financial inclusion, as account ownership is often-times a prerequisite to the access of most services offered by financial institutions. Further to this, it was found that account ownership was asymmetrical along gender, age, and socioeconomic demographics, spelling out a bleak financial reality for the majority of Jordan's residents, and more specifically its marginalized communities.

That being said, in alignment with the Jordan 2025 Vision's goals for Jordan's economy, the Central Bank of Jordan assumed the role of the torchbearer towards sustained and beneficial financial inclusion.

The assumption of this role led to various regulatory reforms, global commitments such as its 2016 Maya Declaration[5], and the launching of the first National Financial Inclusion Strategy in 2017[6]. In doing so, the Central Bank of Jordan repositioned financial inclusion and equity in access to

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[1] World Bank (https://www.worldbank.org/en/country/jordan/brief/qa-jordan-country-reclassification)
[2] Department of Statistics (http://dosweb.dos.gov.jo/population/population-2/)
[3] A Market Study on the Adoption of Digital Financial Services (2021), JoPACC. (https://www.jopacc.com/ebv4.0/root_storage/en/eb_list_page/adoption_of_digital_financial_services_final_report_en_published.pdf)
[4] Global Findex (2017), World Bank. (https://globalfindex.worldbank.org/)
[5] Alliance for Financial Inclusion (2016). (https://www.afi-global.org/newsroom/news/central-bank-of-jordan-makes-bold-maya-commitment-to-financial-literacy-access-for-refugees-gender-dfs-and-data/)
[6] National Financial Inclusion Strategy (2017), Central Bank of Jordan (https://www.cbj.gov.jo/EchoBusv3.0/SystemAssets/PDFs/2018/The%20National%20Financial%20Inclusion%20Strategy%20A9.pdf)

financial services from the realm of development to the mainstream political discourse of the nation. Additionally, 2017 saw the establishment of the Jordan Payments and Clearing Company (JoPACC) by the Central Bank of Jordan and all commercial banks operating in the kingdom, following recommendations made by the World Bank[7]. JoPACC was founded to manage Jordan's domestic payment schemes and assist the Central Bank in achieving its various public policy objectives, the latter of which was clearly documented in its first strategy for the years 2019-2022[8].

a) Mobile money in Jordan

The Jordan Mobile Payment (JoMoPay) Switch was launched in April 2014[9] to tackle one of the main barriers of entry into formal financial services: the minimum requirements for opening bank accounts. This issue, which persists to this day where in 2020 60% of those who do not own bank accounts do not meet its minimum requirements despite 10% needing it, necessitated an alternative form of formal financial accounts that allowed for basic services but were more accessible and affordable. Accordingly, JoMoPay represented the infrastructure through which mobile Payment Service Providers (mPSPs) could offer interoperable mobile wallet accounts to all residents of Jordan. Unlike other mobile money markets, the launch of the JoMoPay prior to the launch of mobile wallets by mPSPs meant that, in Jordan, interoperability was a tenant of mobile money from the get-go. In fact, mobile wallets enjoyed instant interoperable payments 6 years before bank accounts obtained such services with the launch of CliQ[10].

Despite its slow start and utilization, approximately 1.8 million wallets existed within the kingdom as of December 2021[11]. This represents 16.7% mobile wallet penetration per capita. Furthermore, JoMoPay's infrastructure played a vital role in dissolving the financial isolation that marginalized communities experienced during public health measures during the COVID-19 pandemic[12]. During 2021, full-fledged mobile wallet services (including instant payments and transfers, cash in, and cash outs) were provided by 8 mobile Payment Service Providers and partial services (instant payments and transfers) were provided by 7 commercial banks.

Mobile money and the primary tool for its utilization, the mobile wallet, is regulated and overseen by the Central Bank of Jordan. In fact, to protect against uncertainty and mitigate financial risks for end-customers, the Central Bank requires that mPSPs deposit a 100% collateral of issued mobile money at a commercial bank before beginning operations. Thus, all mobile money in the kingdom is backed up by local currency held in escrow accounts.

b) Activating meaningful usage: harnessing the opportunity of the pandemic

Meaningful financial inclusion transcends mere account ownership. It supposes usage to arrive at value for different actors in the local economy, including the end-customers, providers, businesses, and the government. While the road to increasing access had its own challenges, the

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[7] JoPACC 2021 (https://jopacc.com/EN/Pages/About_JoPACC)
[8] JoPACC (2019). (https://www.jopacc.com/ebv4.0/root_storage/en/eb_list_page/strategy_2019-2022_edited-_website-3.pdf)
[9] JoPACC (2021). (https://www.jopacc.com/EN/Pages/JoMoPay__Mobile_Payment_Switch)
[10] JoPACC (2021). (https://www.jopacc.com/EN/Pages/JoMoPay__Mobile_Payment_Switch)
[11] JoPACC (2021). (https://www.jopacc.com/ebv4.0/root_storage/en/eb_list_page/jomopay_transactions_-_december_2021-0.pdf)
[12] Lockdown but not shutdown: The Impact of the COVID-19 Pandemic on Financial Services in Jordan (2020), JoPACC. (https://www.jopacc.com/ebv4.0/root_storage/en/eb_list_page/covid-19_report_english.pdf)

road towards usage was riddled with far greater challenges. An example of these challenges was the general pervasiveness of cash in the Jordanian economy. In fact, this presented stakeholders within the financial inclusion ecosystem with a complex challenge: how to overcome the network effects of paper money.

The national payment system, which is comprised of the various infrastructures and instruments through which money moves around an economy, inherently possesses properties of a platform model. A platform, from a non-technical perspective, creates value to its users through facilitating interactions, most commonly between buyers and sellers[13]. Platforms leverage high network effects, defined as the phenomenon where the value of a product, service, or platform increases the greater the number of its users are[14]. Put simply, people continue using cash because everyone else is using it, despite the apparent disadvantages it might present on both the microeconomic and the macroeconomic level.

In attempting to mimic the ease of payments using cash, while maintaining the added security and efficiency of digital payments, JoPACC introduced and circulated unified QR-code standards for payments using mobile wallets in 2019[15]. The aim of these standards was to extend interoperability, convenience, and affordability to merchant payments across the kingdom. Payments made via QR code utilize existing and prevalent infrastructure in Jordan, notably smart phones which held an 86% penetration rate among adults in Jordan in 2020[16]. Furthermore, given that those payments are processed through a fully domestic payment scheme the transaction costs on the merchants are lower compared to payments relying on international entities to be processed. The Central Bank of Jordan quickly supported this development, mandating all mPSPs to enable QR generation and scanning for end-customers in 2019, and later all banks in 2020[17].

As previously mentioned, the restrictions on movement and commerce which came about as a result of the COVID-19 pandemic presented the mobile money ecosystem with a valuable opportunity. This was mainly due to the National Aid Fund's move towards adopting mobile wallets as a major channel through which disbursement of aide took place[18]. This greatly expanded the existing customer base of mPSPs and led to many individuals holding value in their mobile money. This was seen as an unprecedented opportunity because of those who receive income, 62% of residents had received it exclusively in cash[19].

c) Digital liquidity:

This therefore brings into question the digital liquidity possible through mobile wallets. Digital liquidity describes the usage opportunities for value held digitally. More specifically, digital

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[13] Hermans, J. ,Deloitte Perspectives. (https://www2.deloitte.com/ch/en/pages/innovation/articles/platform-business-model-explained.html)
[14] Stobierksy, T. (2020), Harvard Business School (https://online.hbs.edu/blog/post/what-are-network-effects)
[15] JoPACC, (2019). (https://www.jopacc.com/En/NewsDetails/JoPACC_Launches_JoQR_Payment_Standards)
[16] User Experience of Mobile Wallet Users (2020), JoPACC. (https://www.jopacc.com/ebv4.0/root_storage/en/eb_list_page/jopacc_-_report_on_the_user_experience_of_mobile_wallets-_publishing_version-1.pdf)
[17] Financial Inclusion Report 2018-2020, (2021), Central Bank of Jordan. (https://www.cbj.gov.jo/EchoBusv3.0/SystemAssets/PDFs/Financial%20Inclusion%20Report%202018%20-2020.pdf)
[18] Lockdown but not shutdown: The Impact of the COVID-19 Pandemic on Financial Services in Jordan (2020), JoPACC. (https://www.jopacc.com/ebv4.0/root_storage/en/eb_list_page/covid-19_report_english.pdf)
[19] User Experience of Mobile Wallet Users (2020), JoPACC. (https://www.jopacc.com/ebv4.0/root_storage/en/eb_list_page/jopacc_-_report_on_the_user_experience_of_mobile_wallets-_publishing_version-1.pdf)

liquidity represents the ease at which a user utilizes their digital money to meet their various financial needs, without having to convert this digital money into other forms of money. In a report published in 2020, it was found that only 27% of mobile wallet users in Jordan use their wallets more frequently than once every two weeks. Furthermore, it found that only 11% of mobile wallet users made payments at merchants through their mobile wallets. However, 91% of users reported being satisfied with their mobile wallet, but 85% reported that wider use cases and acceptance are important factors for increasing their usage of mobile wallets[19].

Hence, increasing digital liquidity through the increase of usage opportunities was identified as a prime target towards increasing valuable utilization of digital financial services and the success of digital payment systems[20] such as the JoMoPay. To achieve this, it became increasingly evident that mPSPs should improve their merchant acquiring efforts to increase usage opportunities across the kingdom. However, as is the case with most cash-reliant markets, this proved to be more challenging than initially predicted using traditional means. Instead, the appropriate way to enlist merchants to accept payments through mobile wallets required optimization through a process of trial-and-error and risk-adjusted experimentation. Anchored in this vision, JoPACC and the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH, established the partnership that would become the Merchant Expansion for Digital Acceptance and Liquidity (MEDAL) Facility, aiming to absorb a portion of the risks faced by mPSPs in acquiring merchants and activating QR transactions to increase digital liquidity for mobile wallets in Jordan.

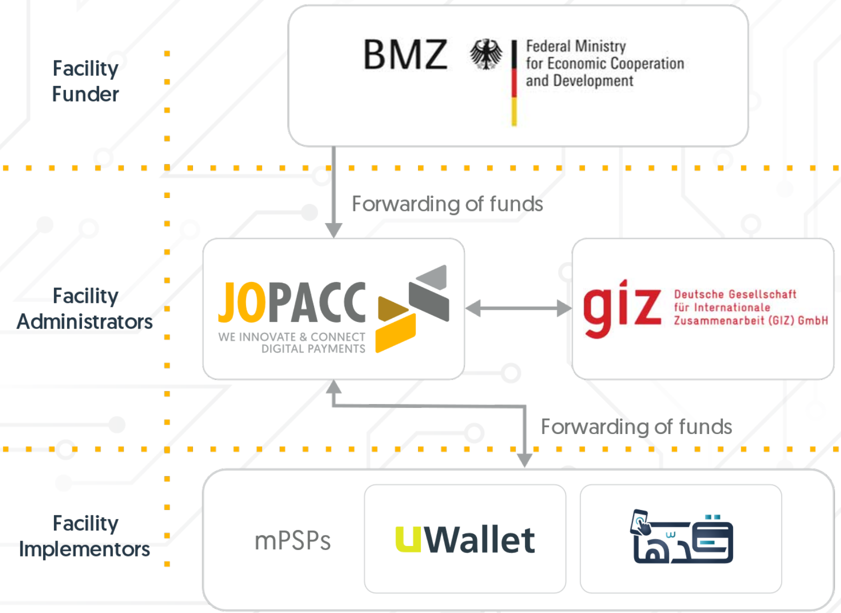
[20] Enabling Merchant Payments Acceptance in the Digital Financial Ecosystems (2016) ITU.

2

Methodology & Stakeholders

Methodology and Stakeholders:

1] Stakeholders



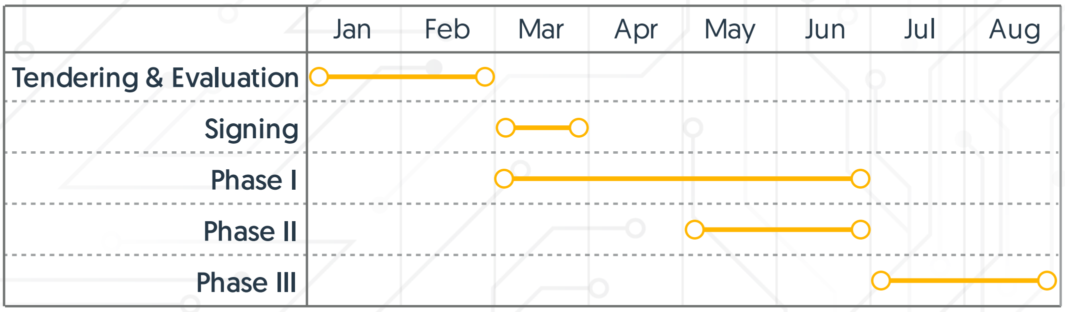
The MEDAL Facility employed a unique model of grant disbursement, whereby an international developmental agency extended the fund to a local entity, which administered it to local, consumer-facing mPSPs subject to meeting predetermined targets.

As such the following three primary stakeholders make up the MEDAL Facility:

Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ)
The GIZ implemented the project through the financial support from BMZ. It developed the Facility in light of its global developmental agenda and provided financial support for the Facility following agreement on the targets, objectives, and method of administration.
The Jordan Payments and Clearing Company (JoPACC)
JoPACC represented the administrator of the Facility. As is the case with the GIZ, it developed the mechanism, targets, and objectives of the Facility and was responsible for the management and administration of the Facility.
The Mobile Payment Service Providers (mPSPs)
The mPSPs represented the recipients of the Facility. As such, they submitted an application in line with the Facility's Terms of Reference on how they plan to meet the targets and objectives of the Facility, and later implemented said plan to receive the funds.

The MEDAL Facility was a partnership method novel to Jordan in terms of the stakeholders and the roles they occupied. Through MEDAL, it was possible to partly absorb the risks faced by mPSPs to enable them to experiment with merchant acquisition and transaction activation of QR-code merchant payments in Jordan, and allowed JoPACC to monitor such experimentation so as to extract and disseminate this knowledge to the overall sector.

2) Planned Facility Mechanism



Through a public tendering process, two licensed mPSPs were to be financially awarded for devising plans, meeting usage criteria and indicators, and publicizing this novel method of payment. The Facility amounts to a total of 95,000JOD, which is to be divided equally amongst the two awarded mPSPs. Furthermore, each mPSP was to finance 11% of the funds awarded to them. The selection was based on the submission of a competitive proposal in compliance with the MEDAL Facility terms previously circulated to them. All licensed and certified mPSPs in Jordan, who were signatories of Jordan Mobile Payment Participation Agreement, were invited to apply to the MEDAL Facility.

The MEDAL Facility is to be comprised of three phases, spanning a total duration of 160 days.

I. Phase One (duration of 70 days)
   - At the end of this phase, each selected mPSP was to acquire 100 new merchants (That is merchants the mPSP had not previously acquired) accepting QR payments, with sufficient geographic, demographic, social, and economic distribution.
   - At a minimum, acquiring 1 wholesaler and/or retailer and/or distributors
   - 1,500 QR-code merchant payments per mPSP.

II. Phase Two (duration of 45 days)
   - At the end of this phase, each selected mPSP was to acquire 100 new merchants.
   - At a minimum, acquiring 1 wholesaler and/or retailer and/or distributor.
   - 1,500 QR-code merchant payments per mPSP.

III. Phase Three (Duration of 45 days)

Phase 3 was a monitoring and evaluation phase, where selected mPSPs should ensure an increase in transaction numbers by a minimum of 15%.

In addition to the above targets set for each of the phases, mPSPs were required to lead a campaign geared towards increasing awareness of QR enabled payments focusing on merchants.

The awareness and marketing campaign had wide geographic and demographic distribution, employing multiple channels and tools to reach a wide audience. mPSPs were also required to convey awareness on QR as a payment method to acquired merchants and mobile wallet holders.

At the completion of each phase, and on the condition of the mPSP meeting all the targets stipulated in the Facility, the mPSP will receive a portion of the fund, where at the end of the third phase, the full fund will have been disbursed to mPSPs who have met all the targets.

Although the phases stated above were circulated ahead of the Facility and incorporated into the plans of both mPSPs who were selected following the tendering process, the Facility had to be restructured during implementation to accommodate for unforeseen circumstances and stagnating progress during initial stages of the Facility. Namely, phase 1 and phase 2 were merged towards the end of phase 1, whereby all targets initially associated with phase 1 were added to the targets of phase 2, and they were treated as a single phase.

Some of the unforeseen circumstances included the government-imposed restrictions in response to the second wave of COVID-19, one of which was a 6 PM curfew. Understandably, such restrictions had a noticeable impact on commerce, which negatively affected transaction numbers and merchant appetite for new technologies. Furthermore, mPSPs prioritized acquiring merchants in the first stages and moved on to activating transactions in the later stages, which also had a negative impact on transaction numbers.

As for the analysis, the data for all transactions which took place through merchants acquired by the two awarded mPSPs was aggregated and analyzed. Furthermore, the trends in usage data for customers who made payments during MEDAL Facility (i.e. the three phases described above) was contrasted with data on their usage pre-MEDAL (2 months prior to the commencement of the Facility) and post-MEDAL (2 months following the end of the facility). Finally, the data pre-MEDAL was compared to the data post-MEDAL as an indicative proxy to measure sustained usage that could suggest the sustainability of the interventions.

3

Results

Results

As previously discussed, the aim of MEDAL was to increase digital liquidity through expanding the number of merchants and increasing the number of QR transactions happening through the JoMoPay infrastructure. As such, the main results are therefore directly tied to said targets.

a) Merchants and distributors acquired

The first target for the Facility was increasing the number of merchants accepting QR codes through the JoMoPay ecosystem. The below figure shows the new merchants acquired during the MEDAL Facility by both mPSPs. It is worth noting that while both mPSPs met the target, one mPSP had greatly gone above this target, acquiring over 70% of the total merchants acquired for this Facility.

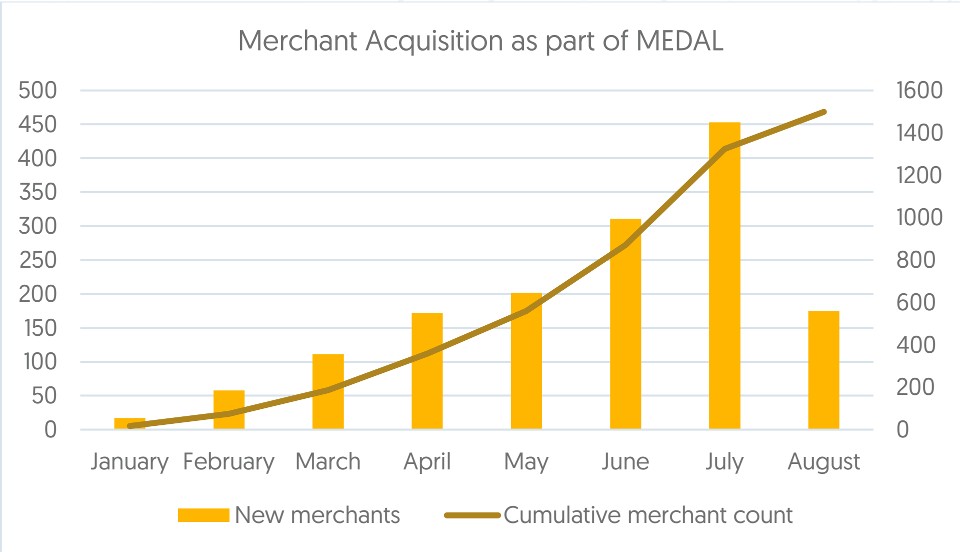


Figure 1: Monthly new merchants and cumulative merchant acquisition by both mPSPs during MEDAL Facility

b) Transaction numbers:
The second target was the increase of QR transaction numbers in the local market. Both mPSPs were able to meet this target. The grey line on the figure below shows the total transaction numbers required as part of the Facility, and the total number of QR transactions achieved through the Facility exceeds double the said amount.

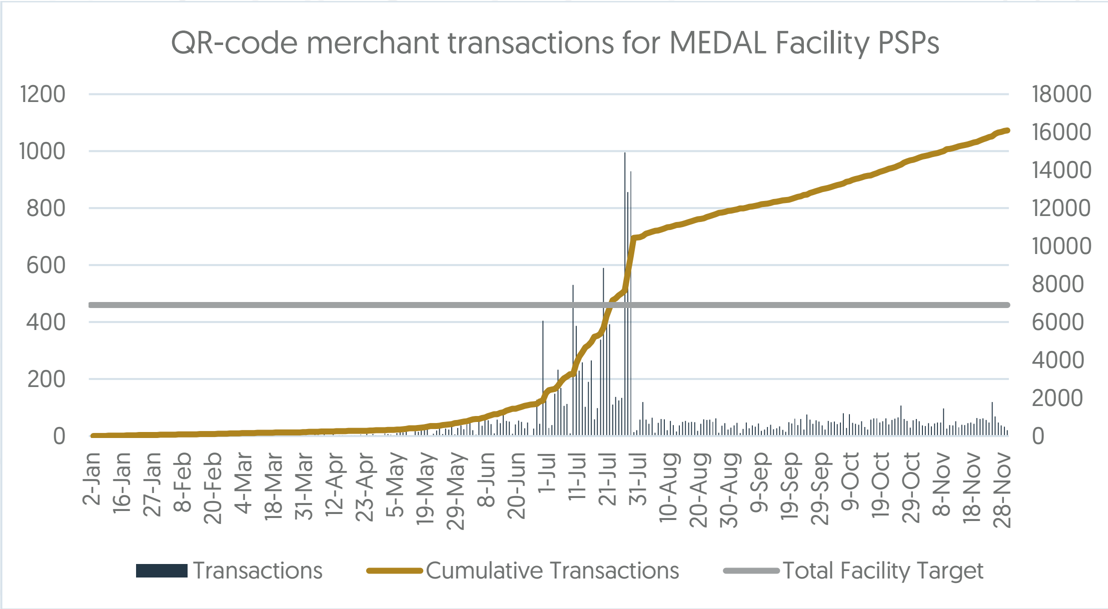


Figure 2: Transaction numbers and cumulative transactions made at MEDAL's mPSP merchants during and after the facility

4

Discussion and Future Directions

Discussion and Future Directions

As discussed in the results section, both mPSPs were able to fulfil the targets set out in the Facility. However, in order to delve deeper and understand the extent of the success of the Facility, a number of questions should first be discussed:

1) Was the MEDAL Facility successful at achieving the objectives it set out the achieve?
2) What were the areas of improvement and major shortfalls identified during the implementation of the MEDAL Facility?
3) How can the lessons learned from the Facility assist scheme managers and mobile payment service providers in the future?

The below is therefore a discussion of each of the questions.

Question 1: Was MEDAL successful at achieving the results it set out to achieve?

In looking at this question, we must first define success in the context of the MEDAL Facility. In looking at the preliminary goals and objectives sought:

1) **Organic and sustainable merchant QR transactions are expected to take place across the JoMoPay system**

a) MEDAL Facility merchants

As this Facility focused on merchants, rather than the conventional emphasis of increasing transactions from the consumer side, it is expected to see a substantial spike in merchant transactions during the Facility. Despite the worsening economic conditions that were a global hallmark of the COVID-19 pandemic, and the associated lockdowns and curfews which impacted mobility and consumption, the MEDAL Facility was successful at increasing merchant transactions.

This can be seen across two metrics of analysis:

i. The increase of transaction numbers during the Facility:

Here, we look at the overall growth of transaction numbers during the Facility. This is a measure for the success of the specific interventions applied by the mPSPs in motivating both merchants and customers alike to transact using their mobile wallets via QR codes. At its highest, the transaction numbers across the Facility increased by an astounding 58028.6%.

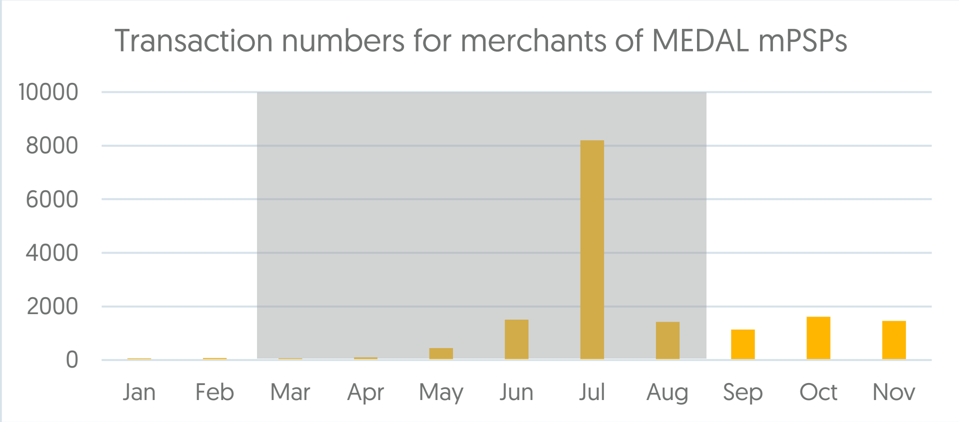


Figure 3: Number of transactions for MEDAL's merchants

ii. <u>The difference in transactions before and after the Facility:</u>

To measure the sustainability of the interventions undertaken during MEDAL, the 3-month period prior to the implementation of the MEDAL Facility was compared to the 3-month period following the implementation of the MEDAL Facility. While the actual difference noticed cannot be ascribed exclusively to the Facility, we can assume that it had a strong positive correlation with the difference in transactions. Figure 3 shows the overall transactions before and after the Facility. Although QR payments are still in their nascent stages in Jordan, the MEDAL Facility clearly had a positive impact on these types of transactions. The elevated transaction numbers following MEDAL indicate that merchants and users alike have adopted QR payments, this will have a domino effect as word-of-mouth increases customer base and merchant satisfaction.

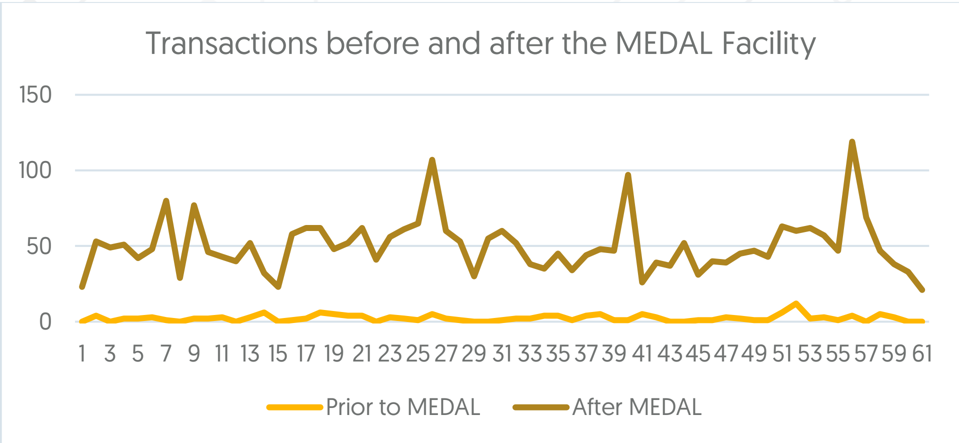


Figure 4: comparing transactions before MEDAL with transactions after MEDAL

2) Encourage licensed mPSPs in Jordan to develop current business, operational, and awareness strategies to promote QR as a payment tool through the JoMoPay ecosystem

The Facility aimed to provide mPSPs with the opportunity of testing out business and operational and marketing and communication strategies and approaches, while absorbing the financial risks that may deter mPSPs from engaging in such experimentation. Given the difficulties in acquiring merchants for mobile wallet payments, an assumption is made that the acquiring process is the major bottleneck for transactions (no merchants- elaborate and reference). Thus, the subtleties of this experimentation and optimization can be deduced from the improvement of merchant acquisition across the Facility as approaches change.

One way in which the mPSPs were able to acquire customers is through a temporary balance between customer acquisition cost and transaction revenue. This was achieved by offloading some of the costs associated with acquiring customers, which represent significant costs in terms of the relative proportion of the overall cost profile of the mPSP and in terms of the importance of the success of customer acquisition efforts, to the revenues generated by merchant transactions. The business model of mPSPs essentially entails that revenue comes from value-added services and business transactions. However, cannibalizing on this revenue stream in the short-term to enable larger and more widescale transactions in the medium-term and the long-term could yield significant success to the mPSP in the future.

Both mPSPs in the Facility opted to increase the presence of QR payment acceptance in the market through leveraging existing pervasive infrastructure in the local market. This was done primarily through two different types of merchants, the first being a health insurance platform acting as an aggregator for various healthcare establishments (doctors, pharmacies, labs, distribution centers, etc.) and the second being a Point-of-Sale (POS) aggregator with over 6,000 locations across the kingdom. Although this didn't necessarily bring the mPSPs closer to meeting their merchant acquisition targets, as counting such aggregators were capped at one merchant per region, it greatly increased the presence of QR payment acceptance in Jordan. Furthermore, albeit this acquisition of such merchants and aggregators was more laborious and costly as compared to another merchant, through economies of scale the costs were divided amongst large subsets of merchants and therefore became feasible.

One of the mPSPs launched two noteworthy campaigns which were meant to amplify the word-of-mouth customer acquisition strategy. These campaigns were unprecedented across the Jordanian market. Customers could pay (0.001 JOD) for a selected item at two selected stores using QR, equivalent to USD 0.00014. For example, as part of one such campaign customers could purchase a cup of coffee for 0.001 JOD using QR payments. These campaigns were very popular and attracted waves of new users to make payments using QR at these merchant locations. This was a successful attempt at recruiting the word-of-mouth customer acquisition strategy, given the number of new users trying out the service and the expected spillover effects these users would potentially exert within their social circles.

Of the 291 total customers who have engaged in these promotional campaigns, only 0.7% had used their mobile wallets prior, with only 0.3% being active mobile wallet users. In fact, comparing the pre-intervention period (January-March 2020) with the intervention period, there was an approximately 5219% increase during the intervention period in QR usage for merchant payments. While this is expected, given the incentives introduced during the intervention period, analyzing the post-intervention period indicates that this increase had a long-lasting effect. In fact, comparing the pre-intervention period with the post-intervention period shows a 481% increase in QR transaction numbers for that segment that used the QR-codes for payments during the MEDAL Facility. Such results are of great value to the mPSP, whereby QR merchant payments represent an attractive revenue stream through which they can improve profitability and reduce transaction costs on individual customers. In fact, it introduces a vital demonstration of ways in which mPSP could activate customer usage and utilization, through reducing the barriers to experimentation and uptake by offering an attractive incentive leading to sustained uptake.

Merchant communication and awareness is regarded as one of the main factors affecting subsequent activation of the merchant. Merchant acquiring follows four primary stages[21]:

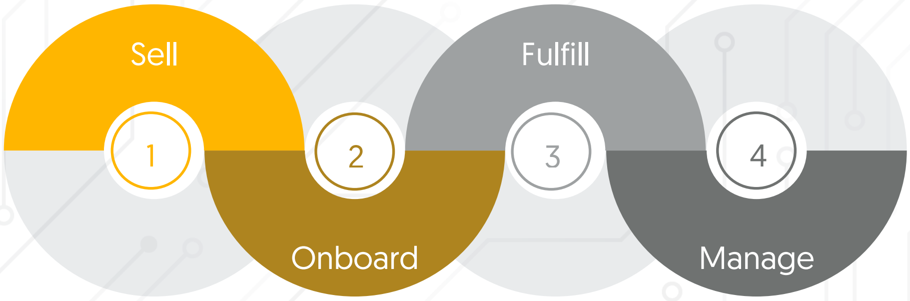


Figure 5: The cycle of Merchant Acquisition

1) <u>Sell:</u>
   This stage involves the mPSPs' sales team identifying the merchant, screening them, approaching them, and signing a merchant acquiring agreement to begin offering this service to their customers.
2) <u>Onboard:</u>
   The merchant is given the proper introduction to the service, its fees, how to use it, and the terms associated with usage.
3) <u>Fulfill:</u>
   The mPSP fulfills the onboarding journey by providing the merchant with the infrastructure to accept payments (typically a POS device) along with their credentials to access the service.
4) <u>Manage:</u>
   The mPSP manages the merchant to ensure smooth resolution of issues and satisfaction with provisioned services.

Both mPSPs participating in the Facility demonstrated excellent performance in the first stage of the merchant acquiring process. However, it became evident that the bottleneck to successful completion of the merchant acquiring was the second stage; the onboarding stage. Oftentimes, the first and second stages of the process were merged into one, undoubtedly giving higher emphasis to the sale of the service as compared to the onboarding necessary for merchants to understand how (and why) to use it. Furthermore, the fulfillment stage was often delayed to the point where merchants might not have retained the information presented in the initial stage at the point of activation. This represented a major challenge to mPSPs in activating their merchants and subsequently routing transactions through their platform. As such, this is identified as an area of competency that needs further specialization and strengthening on the mPSPs' side. Although each of the aforementioned stages is of equal importance, mPSPs in the local market should invest further in the onboarding stage to smooth out this bottleneck and create valuable relationships with merchants in the market. Additionally, streamlining the process and minimizing the duration between stages could yield better outcomes for each of the stages. While the temporal duration of the Facility could have played a factor in mPSPs prioritizing the sale stage in terms of duration, reducing the duration between phases could have yielded better merchant activation than observed throughout the Facility.

CGAP (https://www.cgap.org/research/publication/acquiring-models)

3) Increasing digital liquidity through increasing usage opportunities in the local market

Through the MEDAL Facility, over 1,000 new merchants were acquired. This was 10 times higher than the target for merchant acquisition stipulated at the beginning of the Facility. That being said, when comparing the cash-out value and volume of customers interacting with MEDAL Facility merchants, no significant difference was found in pre-intervention and post-intervention phases, despite the post-intervention phase having a lower mean cash-out value. While this remains inconclusive, it may be too soon to determine a correlation between the interventions employed during MEDAL and the way in which digital liquidity manifests in the subset of customers.

Furthermore, due to the upgrade of the JoMoPay to the ISO 20022 infrastructure and the resultant interoperability between mobile wallets and bank accounts in Jordan [22], digital liquidity for mobile wallet users is expected to substantially increase and acceptance for interoperable payments (e.g. bank customer to mPSP merchant) will become possible. This reenforces the importance of interoperability in driving value for end-users while reducing costs for providers.

<u>Question 2: how could MEDAL have improved? What were the primary shortfalls of the interventions?</u>

The phased structure of the MEDAL Facility, which included targets relating to both acquisition and usage could have been better improved if phases were tied to focused targets. For example, dedicating the first phase solely to merchant acquisition and the second phase solely to transaction numbers will likely have allowed the mPSPs to focus their efforts on meeting one target, rather than both at a given time.

Furthermore, a noteworthy challenge that became evident during the implementation of the MEDAL Facility was the way in which merchant onboarding was taking place. Merchants are at the forefront of enabling QR transactions in Jordan's mobile money ecosystem and should therefore be the focus of extensive awareness campaigns and training to ensure that the service can trickle down to consumers through the merchant side.

<u>Question 3: main lessons learned from the Facility and future directions for similar implementations</u>

a) <u>Incentivization pushes trial in customers that are unfamiliar with the service or have never used it before</u>

One of the main takeaways from the MEDAL Facility was an interesting insight on consumer behavior. The promotional campaigns triggered immense usage amongst customers who have never paid using QR-codes before. This could be indicative of a risk aversive user-base that is not inclined to experiment with their day-to-day transactions. The incentives often offered consumers to make common purchases (such as coffee or a meal) for very low prices, thus it removed the weariness of experimentation and led to swaths of customers trying out this new method of payment. While not all customers who tried this method of payment will become regular users of it, those who enjoyed the experience will have been given the opportunity to begin using it. Such

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[22] JoPACC (2021). (https://www.jopacc.com/En/NewsDetails/JoMoPay_is_upgraded_to_the_ISO_20022_Standard_and_has_gone_liv

campaigns have thus proven successful and should be considered by other mPSPs in the local market.

b) This grant model of risk absorption has been successful at promoting innovation and experimentation on the side of the provider

With regards to the overall model of the MEDAL Facility, it can be deemed successful as it allowed mPSPs to experiment with business and awareness strategies, without facing the risk of substantial financial losses. Development agencies and stakeholders in the financial inclusion space should therefore look towards such partnerships to allow private sector entities to enhance the way in which they bring value to customers. Furthermore, JoPACC regards experimentation as a vital step in the way it develops its solutions and services to best meet the needs of the market. As such, other private sector entities should dedicate resources to this model of product optimization to ensure innovation yields the desired results.

c) Targeting merchant segments with more tech-savvy customers will yield better results

QR-codes for payments are a relatively novel means of payment in Jordan. While merchant buy-in is important, choosing the merchants is just as valuable. When selecting the merchants, it is important to keep in mind who their customers are, and whether they enjoy trying out new technologies in their day-to-day lives. This should be an initial point of focus, as word-of-mouth and social mimicry will lead to usage spilling over to other, less tech-savvy users eventually.

d) Merchant awareness

The importance of awareness and training can never be overstated. Merchants should not only know the service but feel confident using it. While this may entail higher acquiring costs for the mPSP, it will eventually translate into higher returns when merchant transactions start to increase and represent more substantial segments of the mPSP's revenue streams.

e) Sustainability

While the post-MEDAL period was brief, it is recommended that both mPSPs (and any entities wishing to replicate these interventions) measure the long-term effects of the discussed interventions on the customers who participated. This would allow a better understanding of the long-term sustainability of the interventions and ways in which this can be improved.

Conclusion

While MEDAL Facility's aims and objectives revolve around tangible metrics, its ultimate objective transcends sectors, geographies, and technologies. Trial and error can represent an unmatched opportunity for providers across the world to understand their customers better and meet their needs. Thus, in concluding this report, an open invitation is made to you, dear reader, to put things to the test. The bulk of human knowledge has been grounded in experimentation, and employing this in non-academic fields will inevitably be of value to all stakeholders involved.