Benefits, anxieties, acceptance, and barriers to the new injectable contraceptive DMPA-SC (Sayana Press): Clients’ perceptions in Sindh, Pakistan [version 1; peer review: awaiting peer review]

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Abstract

Background: Injections are Pakistan’s third most preferred contraceptive method because of their convenience. They represent a 2.5% share of the contraceptive prevalence rate (CPR) and contribute 10% to the current CPR. However, injections require a clinical setting or a healthcare provider for administration. A new method of subcutaneous presentation of depot medroxyprogesterone acetate (DMPA-SC), namely Sayana Press in Uniject™, has been introduced, which can be administered in nonclinical settings or self-administered by trained women. This study examined clients’ perceptions of the current depot medroxyprogesterone acetate-intramuscular injection (DMPA-IM) and its accessibility, availability, affordability, advantages, and disadvantages. In addition, it explored the benefits, barriers, and challenges regarding the new method of DMPA-SC (Sayana Press), especially considering self-injection.

Methods: The study was conducted in Sindh, Pakistan. Three focus group discussions were conducted with 9–13 female participants with different demographic characteristics. A semi-structured questionnaire was used. The discussion was recorded, transcribed, and translated from Urdu or Sindhi to English. Transcripts were coded precisely, and data analysis was performed using NVivo software.

Results: Participants expressed moderate fear of self-injection and risk of an inaccurate prick, suggesting that DMPA-SC acceptance may not be challenging at a community level. They appreciated free services at public health facilities, as the affordability of private facilities may be challenging for those with low income. Most participants agreed to pay PKR 50–300 (approximately 1 USD or less)
as service charges for a private facility, while some agreed to pay for transportation costs when lacking alternative methods.  

**Conclusions:** DMPA-SC is a valuable alternative, provided its challenges are adequately addressed. Information about self-injection contraceptives is currently limited, and shared self-administration may be difficult without adequate training and counseling. Nevertheless, clients prefer the self-injection method for family planning to avoid transportation and private service charges.

**Keywords**  
Contraceptive, DMPA-SC, Sayana Press, Injectable, Sindh, Pakistan, Women, Perception

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Introduction

Pakistan has the fifth-highest population worldwide, with 207 million people. The rising trend of population growth has continued since the country’s independence. Subsequently, family planning (FP) programs were introduced by a non-government organization, the Family Planning Association of Pakistan (FPAP). However, during the regime of General Ayoub Khan, the government officially included FP as a program in the national policy and planning during the second five-year plan (1960–65). Nevertheless, approximately 60 years after the program’s inception, Pakistan’s contraceptive prevalence rate (CPR) has not significantly increased. It remained almost static for 10 years, at 34%. The demand for FP remains high in Pakistan: four million (17%) married women of reproductive age have not yet received FP services. According to the Pakistan Demographic and Health Survey (PDHS) 2017–18, the total demand for FP is 52% among married women of reproductive age (MWRA); eight million (34.2%) MWRA are currently using FP methods, among whom approximately six million (25%) MWRA are using modern methods, whereas the remaining 9% are using traditional FP methods. Male condoms (9.2%) and female sterilization (8.8%) are the most common methods, encompassing 72% of the modern contraceptive prevalence rate. Injection (2.5%) is the third most popular method of FP among women using modern contraceptives, with a higher rate than the long-term method of an intrauterine contraceptive device (2.1%). It makes up 10% of the modern CPR.

The current injection method, depot medroxyprogesterone acetate-intramuscular injection (DMPA-IM), has limited service access, as it requires a clinical setting or the assistance of a trained healthcare service provider to deliver this method of contraception. The subcutaneous presentation of DMPA (Sayana Press) is a 104-mg single dose of medroxyprogesterone acetate in 0.65-ml volume, sterilely packaged in the Uniject™ device. Uniject™ is a pre-filled, non-reusable blister injection system comprising a bubble reservoir with an integral, ultra-thin needle, believed to be a notable advancement in the field. It has several features that add advantages to the new injectable method. Community health workers, for example, female health and family welfare workers or women desiring to inject a contraceptive themselves after training, can administer it in nonclinical settings. Accepting Uniject™ as a self-injection can meet demand in all situations, particularly when access is restricted because of natural disasters, during public health emergencies such as the coronavirus disease 2019, and for remote administration under the self-care model. After the stipulated training, female clients can easily self-administer the injection with complete privacy. The product’s shelf life is also adjustable following Pakistan’s climate conditions and can be easily stored at an average room temperature (15–30°C).

The Sayana Press summary of product characteristics, under “Section 4.8 Undesirable effects,” states that commonly reported injection-site reactions include persistent injection-site atrophy, indentation, or dimpling; injection-site nodules or lumps; and injection-site pain or tenderness (occurring in ≥ 1/100 to < 1/10 cases). Lipodystrophy (acquired) is rarely reported (occurring in ≥ 1/10 000 to < 1/1000 cases) in patients receiving subcutaneous DMPA (DMPA-SC). According to Pfizer Limited, the product’s manufacturer, evidence suggests a minute increased risk of cardiovascular events among women with hypertension or lipid disorders who used progestogen-only injectables. If hypertension occurs during Sayana Press administration or its increase cannot be adequately controlled using antihypertensive medication, its administration is risky. Additional risk factors for arterial thrombotic disorders include hypertension, smoking, age, lipid disorders, migraine, obesity, positive family history, cardiac valve disorders, and atrial fibrillation. The company also claimed that patients with the above risk factors should use the Sayana Press method cautiously.

The Sayana Press is a new contraceptive method in its inception phase in Pakistan, with support from the public sector in Sindh province. Initially, Sayana Press was discussed in the costed implantation plan (CIP) regarding FP for Sindh in 2015 for its introduction and implantation. DMPA-SC (Sayana Press) was introduced in Sindh, Pakistan, in 2019 after a randomized control trial comprehensive study provided evidence that lady health workers can safely and effectively administer injectable contraception, including DMPA-IM and DMPA-SC, to their clients after training. The CIP unit of the population welfare department, the Government of Sindh, with help from RIZ Consulting, also conducted a pilot study on DMPA-SC self-injection. Considering its results, the Government of Sindh developed a rollout plan for self-injection through its CIP. Sayana Press can pave a significant trajectory for modern FP methods with self-injection features because it provides safety and ease of subcutaneous injection use. Like the Government of Sindh, health and FP ministries of other countries, for example, Nigeria and Senegal, have enacted policies allowing community health workers to administer the product and even permit drug stores and shopkeepers to engage in direct sales. This product, which expands the availability of contraceptives, can increase FP services, specifically in communities where access to FP services, especially injectables, is limited. The government’s and donor agencies’ efforts to increase the use of Sayana Press show its impact. However, understanding of Sayana Press is limited, specifically regarding client perceptions. Sayana Press has new self-injection features. Therefore, learning about clients’ experiences and perceptions regarding this change is crucial. Hence, this study addresses this deficit by collecting insights from end users.

Study aims

The study primarily aimed to gain insight from clients to understand women’s perceptions of the current form of injection (administered by a trained healthcare provider) and the new injection method DMPA-SC, considering the objectives given below:

- Obtain clients’ perspectives regarding the current contraceptive injection (DMPA-IM) use, considering
accessibility, availability, affordability, advantages, and disadvantages.

- Obtain clients' perceptions regarding the new method of DMPA-SC as self-injection, considering benefits, fears regarding self-injecting, potential challenges or barriers that clients face, and their perceptions of Uniject™, especially concerning self-injection.

**Methods**

**Ethical considerations**

This study received ethical approval from the Research Ethics Review Committee, Health and Hospital Management Program, Institute of Business Management, Karachi (IRB no. 20161–21588; approved on March 10th 2021). The researcher informed the participants about the research objectives in their native language, and verbal consent for participation and data publication was obtained before proceeding to the discussion. After their consent was obtained, which the interviewer recorded in interview forms, the discussion was recorded for future transcription. The respondents of the study belonged to different demographic backgrounds (geographical Rural, Urban, and education) and participants did not want to disclose their identity in any way. Verbal consent was approved by the Research Ethics Review Committee.

**Study design**

This qualitative study used the focus group discussion (FGD) method by adopting a purposive sample technique instead of a statistically representative sample of a broader population to gain an in-depth understanding of social issues. FGD serves to solicit information regarding participants’ attitudes and perceptions, knowledge and experiences, and practices shared during interactions with different people. The technique assumes that during FGD, group dynamics will be activated to help identify and clarify shared knowledge among group members, which would otherwise be challenging to obtain through individual interviews. Participants were recruited following the guidance in “How to conduct FGD Methodological Manual” by Peter van Eeuwijk and Zuzanna Angehrn. Furthermore, they were recruited according to the inclusion criteria of being married, with the help of social mobilizers providing FP services in these areas. The number of participants was finalized considering the manual, and in each FGD, 9–13 women with different demographic characteristics, including education, parity, profession, and age, were included. According to a previous study, three FGDs are sufficient to reach saturation of codes. Hence, three FGDs were conducted for this study.

The Government of Sindh introduced Sayana Press DMPA-SC in a few selected districts. The selection of areas for study from districts (Karachi, Hyderabad, and Sukkur) was intended to ensure adequate representation of urban and rural participation. The FGDs were conducted using a semi-structured field guide comprising an open-ended questionnaire developed through available literature. Its contents and face validity were evaluated, and a pilot test was performed through an internal testing process, as outlined by DeVon et al. First, the tool kit was finalized in English. It was then translated into Urdu and Sindhi. Considering cultural constraints, female data collectors with expertise in the above languages were engaged to conduct FGDs, during which they encouraged respondents to participate in the study. The participants were recruited with help from field workers during the last week of March 2021 at three sites, and data were collected and completed from April to May 2021. The researchers informed the participants about the research objectives in their native language and obtained their consent before proceeding to the discussion. After their consent was obtained, the discussion was recorded for future transcription. The total duration of all three FGDs was 143 minutes (not including the general introduction and rapport-building process, which were not recorded). The audio was initially transcribed in the original recorded language (Sindhi and Urdu) and later translated into English and cross-checked by professional linguists.

The researchers used the guidelines by Braun and Clark and followed the following six defined steps:

**Stage 1: Familiarity with the data**

The guidelines indicate that the researcher should become familiar with the dataset before starting the analysis. In the current study, the researchers had direct experience in the FP field and belonged to the local community. In this case, having a substantial understanding of the subject and the language used by the respondents was ensured. The researchers repeatedly read the transcripts and listened to the audio recordings to understand the responses in-depth.

**Stage 2: Generating initial codes**

Following the guidance of Braun and Clark, this study used a top-down method for developing initial codes aligned with the research questions and objectives, applying a deductive approach. Each data segment relevant to the research objectives was evaluated and assigned codes. Open coding was used and modified throughout the process. This strategy helped to clarify how participants provided feedback regarding their access to the FP services, especially concerning the DMPA-IM injection and the side effects or disadvantages of the injection method.

**Stage 3: Preparing themes**

Generally, themes are patterns relevant and notable to the research objectives. As Braun and Clarke provided no specific rules for themes except for using the nearest associations, this study created two major themes, considering the comparison between the two injection methods, one each for DMPA-IM and DMPA-SC, and recorded the coding in each area. The details of the coding are provided in Table 1. This approach is used when a study is driven by research questions.

**Stage 4: Reviewing themes**

After gathering the codes in two broader areas, those with closer associations were grouped to develop subthemes aligned with the research objectives. This review process was performed considering specific vital questions, as discussed by Maguire and Delahunt.
The details of the reviewed themes and subthemes were summarized following the codes, their meaning, and close associations, avoiding overlapping and considering the research objectives, as provided in Table 2.

### Stage 5: Defining themes

This stage required the final refinement of the themes by identifying the essence of each theme. It primarily addressed the following questions:

- Do the themes make sense?
- Do the data support the themes?
- Am I trying to fit too much into a theme?
- If the themes overlap, are they actually separate themes?
- Are there themes within themes (subthemes)?
- Are there other themes within the data?
These questions were examined and applied accordingly.

Stage 6: Write up
The final stage involved writing the study results, including its findings, conclusions, and recommendations. Next, the data were analyzed using NVivo software version 11 (RRID: SCR_014802) (free alternative, Taguette), as this has been used for similar research objectives that necessitated deductive and inductive codes, requiring deeper involvement in the analysis process. In addition, this method was utilized because it allowed an in-depth understanding of the data and the issue under investigation, which is paramount in qualitative research. Finally, the results were recorded and presented accordingly.

Results and Discussion
The participants were recruited from diverse demographic backgrounds to meet this study’s research objectives. After receiving approval from the ethical committee, the participants were recruited with help from local field workers. Table 3 presents the demographic profile analysis.

This study involved the new method of injection DMPA-SC (Sayana Press) for FP, regarding which there is only limited literature. Hence, a deductive coding method was primarily used in the study. Typically, the codes in deductive coding are theoretical concepts or themes drawn from the existing literature, while inductive codes are framed through the analytical process. In a deductive coding approach, the number of codes is typically relatively limited, with approximately five to 10 codes derived from the theoretical framework. This study’s codes were identified following the research objectives. Two major themes were developed, including perceptions of using the existing method of DMPA-IM injection and DMPA-SC Sayana Press. The findings regarding these codes are discussed below.

<table>
<thead>
<tr>
<th>Concerns of FP service clients, especially regarding DMPA-IM</th>
<th>Motives for new product DMPA-SC</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub themes: Access to FP services</td>
<td>Sub themes: Fear regarding self-administering DMPA-SC</td>
</tr>
<tr>
<td>Affordability for clients of FP services</td>
<td>Pricing for DMPA-SC</td>
</tr>
<tr>
<td>Barriers to FP Services/DMPA-IM</td>
<td>Acceptance of DMPA-SC</td>
</tr>
<tr>
<td>Advantages and disadvantages of injection (DMPA-IM) services</td>
<td>Affordability/readiness to pay for DMPA-SC</td>
</tr>
</tbody>
</table>

• What theme is presented?
• If subthemes exist, do these interact and narrate according to the central theme?
• Do the themes correlate with each other?

Clients’ perspectives on FP services, especially DMPA-IM

FP service access
Participants from the rural areas shared their dependency on public sector services, while 50% of the urban participants preferred selective private healthcare services. Accessibility and shortage of supplies were reported as challenges to accessing the injection method. According to a participant:

“Civil hospital [government facility] is far from us. We face problems in reaching there, and sometimes when we go there, they have problems with availability and say injections are not available in stock.” (FGD-Hyd; Participant C).

Clients without financial support depend on the public sector for FP services because they lack options due to resource constraints. According to a participant:

“Those who had wakfa [Gap / FP services] are likely to be more satisfied with the services of private hospitals, but those who are poor like me remain satisfied with the government hospital because they have no other choice.” (FGD-Suk; Participant B).

Additionally, in rural areas, women primarily make decisions regarding FP services. Sometimes, they obtain their husband’s consent. In other cases, they decide without informing their partner. Furthermore, men are influenced by religious thoughts, as a participant shared:

“My husband says Allah [God] promised to give us food by hook or crook, then why do you want to have wakfa [FP services]? Now my husband does not know I had wakfa. But he is saying we will give birth to a little baby girl because all other children are young, and now we should have a little baby.” (FGD-Suk; Participant G)

These results align with previous research findings, suggesting that the family size is larger among families where the husband opposes contraceptives because of a perceived religious prohibition of their use.
Affordability of FP services for clients

Poverty was a complex challenge across all the FGDs. It was worse in rural areas, as a participant shared:

“Sometimes our children do not have a copy [notebook for writing] or pen, or sometimes they do not have a dress. So, we put more effort into making handicrafts and selling them. We fulfill our needs and hope for a brighter future for our children; it is not possible to spend money on FP services.” (FGD-Suk; Participant B)

Clients in rural and urban areas receive injectable contraceptives free of charge at public sector facilities and pay charges only for transportation. By contrast, while at private facilities, they must pay for both service charges and transportation costs. However, certain factors motivate clients who can afford to visit private health facilities. Regarding the comparison of public and private hospital services in terms of their availability, a participant shared:

“People with no financial issues go to private clinics to save time and believe that things that are free of cost are not reliable. I have experienced both private and public facilities, and I can surely say that government commodities are reliable, and their services are better than private facilities.” (FGD-Kar; Participant D)

It was found that even in the presence of substantial information regarding family planning methods in the community, it is still difficult to get agreement from female clients to start contraception. This perspective aligned with a previous study’s findings that women find accepting the FP method and its cost challenging.21 According to a participant:

“Convincing women for FP is difficult; if it is hard to convince people to receive the free-of-charge FP method, it would be much harder to convince them to pay from their domestic earnings for FP.” (FGD-Kar; Participant E)

We also found that given the lack of options for FP, clients from all settings were willing to pay PKR 50–300 to only private providers as service charges for injectable contraceptives.

Barriers to FP services (DMPA-IM)

Women’s ability to travel is a significant barrier to accessing FP services, including DMPA-IM injection. According to a participant:

“Transportation and affordability are big issues. Do you know why? Suppose a woman has six children; take my example, I have six children, and my husband does not have any proper income. So, I can hardly pay the bus fare. If I request another woman to accompany me, I would have to pay her fare, too, because I am taking her for my FP, which is free of cost, but I cannot afford both expenses. If the government provides me with transportation facility, I could feel at ease that I received a method that is free of cost and my transportation is also free.” (FGD-Kar; Participant D)

These findings align with the results shared by male participants in a study conducted by Dr. Sara Saleem and colleagues in Pakistan.21 Deciding on FP and the unavailability of counseling services were also reported as barriers in the study. According to a participant:

“Last December, I gave birth to a baby girl, and she suddenly died after birth because I had not planned my pregnancy or delivery. I mean to say that we women often take risks to have another child but do not come forward for the FP method. It is very difficult for us to decide about opting for FP methods. But the services of FP workers are very good, as they mobilize people to come forward, take a decision, and get FP method.” (FGD-Kar; Participant E)

Notably, women appreciated the role of health workers in mobilizing clients and helping them decide whether to access FP services.

<table>
<thead>
<tr>
<th>Profession</th>
<th>Job</th>
<th>Housewife</th>
<th>Domestic laborer</th>
<th>Agriculture Labor</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>8</td>
<td>14</td>
<td>6</td>
<td>33</td>
</tr>
<tr>
<td>Age Range, Years</td>
<td>18–30</td>
<td>7</td>
<td>31–40</td>
<td>16</td>
<td>8</td>
</tr>
<tr>
<td></td>
<td>41–50</td>
<td>8</td>
<td>51 and above</td>
<td>2</td>
<td>33</td>
</tr>
<tr>
<td>Education</td>
<td>None</td>
<td>16</td>
<td>Primary</td>
<td>5</td>
<td>33</td>
</tr>
<tr>
<td></td>
<td>Middle</td>
<td>5</td>
<td>Matriculation and Higher</td>
<td>5</td>
<td></td>
</tr>
<tr>
<td>Marital Status</td>
<td>Not Married</td>
<td>0</td>
<td>Married</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td>Separated</td>
<td>1</td>
<td>Widowed</td>
<td>30</td>
<td>33</td>
</tr>
<tr>
<td>Number of Children</td>
<td>0–1</td>
<td>4</td>
<td>2–3</td>
<td>8</td>
<td>11</td>
</tr>
<tr>
<td></td>
<td>4–5</td>
<td>1</td>
<td>6 and above</td>
<td>1</td>
<td>10</td>
</tr>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>33</td>
</tr>
</tbody>
</table>
Advantages and disadvantages of injection (DMPA-IM) services
Most participants shared that injectables can readily be accessed, while some reported that a shortage of supplies and perceived side effects are significant disadvantages. The injection method was preferred among participants. A few of the crucial benefits, according to the participants, included the following:

“Injection means three months of relaxation.” (FGD-Kar; Participant E).

“As I have observed, the injection is effective because I had also used pills, but it caused menstrual cycle two or three times in a month.” (FGD-Hyd; Participant A)

The leading client perception regarding existing DMPA-IM included changes in the menstrual cycle as disadvantages of injection, aligning with previous studies\(^\text{21}\). According to participants:

“There is a problem; I heard that the injections available in the government hospitals are not of good quality and are less effective. My aunt shared with me about her health and weakness, similar to what I felt, especially blood pressure problems, after using the injection method.” (FGD-Hyd; Participant C)

“We do not get periods after taking an injection. In a month, we are fine for 10 days, but after 20 days, we start feeling ill.” (FGD-Suk; Participant G).

Perspectives of the new product (DMPA-SC)
Fear regarding self-administration of DMPA-SC
We found that participants in all settings showed moderate fear of self-injection. Information regarding the new method is minimal. Moreover, even those aware may not know about its self-injection features. After presenting a demonstration of the new method and observing Sayana Press physically, participants shared their concerns regarding self-injection, specifically the risk of an inaccurate prick, aligning with other studies conducted worldwide that revealed such fear associated with self-injection\(^\text{22,23}\). Participants lacked information about the new method and its self-injection features. However, they showed a willingness to use the self-injection method after adequate training. According to participants:

“If I cannot inject others, then how can I do it for myself, and if I prick it wrong, what would I do? However, I can do it if someone trained me.” (FGD-Suk; Participant B).

“It will be beneficial for us since we are busy with in-house chores; if I forget the injection date, I start feeling fearful, and another point is that if we get an injection by a doctor, we feel ill or unhealthy. If we receive an injection for self-use, we will feel good. However, about the concern of self-administration, after a few times, it will be easy to perform, and finally, the fear will be over.” (FGD-Kar; Participant D).

Pricing for DMPA-SC
Most participants appreciated the free services at the public sector health facilities. However, economically compromised clients have difficulty paying private providers to access the injection at a private facility. In addition, we found that the affordability of DMPA-SC is challenging in the private sector, especially for low-income clients. Participants also assumed that DMPA-SC must be expensive. According to participants:

“I think this must have a high price because this is a new method and has different features.” (FGD-Kar; Participant K)

“Poor people cannot afford costly injections, and this seems costly.” (FGD-Suk; Participant G)

“I think if it is expensive, by hook or crook, we can manage to pay, but if there is a reaction, we may die or face complications.” (FGD-Hyd; Participant C)

This viewpoint is similar to the perceptions of Nigerian clients; the perceived cost to clients was among the most significant concerns\(^\text{24}\). Participants in this study agreed to pay between PKR 50 and 300 (equivalent to 1 USD) as service charges to private providers. Others agreed to pay transportation costs to receive free public sector health facility services.

Acceptance of DMPA-SC
Clients preferred the self-injection method to avoid private providers’ transportation and service charges after adequate training. According to a participant:

“To avoid transportation issues, especially for those women who go outside for services, home-based service is better.” (FGD-Kar; Participant C)

This opinion aligns with findings from a study in Ghana, where women preferred a home-based self-injection method to avoid transportation costs, waiting time at service providers, privacy, and unavailability of providers during their visit\(^\text{25}\). In addition, most participants shared that accepting DMPA-SC is not concerning, especially at the community level. However, acceptance and threats from private providers were found in the current study. According to participants:

“Self-injection will decrease the number of clients coming for injection, so private service providers will spread misinformation about this new method; for example, they can strengthen the perception of inaccurate prick and its negative consequences.” (FDG-Kar; Participant I)

“Private doctors are charging a 50 rupees fee for injection and wish that more patients would come, so their business will go down with the self-injection method. However, the government doctor wishes that patients would not come to them and consider them a headache.” (FGD-Hyd; Participant B)
“The doctor would be angry about this if something went wrong. The best option is to get an injection from the doctor.” (FGD-Suk; Participant G)

The present study confirms the perceived likelihood of threat from the service providers for self-injections, aligning with the findings of Spieler1, who suggested that doctors, nurses, ministries of health, and midwives may feel threatened (because, historically, a medical doctor administers injections) and create a backlash against using a product that is self-injected6.

Affordability and readiness to pay for DMPA-SC
Most participants agreed to pay private providers PKR 50–300 (approximately 1 USD) as service charges. By contrast, others agreed to pay for the transportation cost if they did not have options for other methods. According to participants:

“The maximum that I can afford is 200 to 300 (PKR), but I will have an agreement with that doctor on stamp beforehand that if I become ill, then they will bear all expenses of my treatment, and it would be their responsibility.” (FGD-Suk; Participant G)

“Maximum of 200 to 250 (PKR); if it is more than this amount, up to 1,000 rupees, no one can buy or afford.” (FGD-Suk; Participant B)

“Normally an injection costs 150 to 200 rupees at a private clinic, so if it is safe, women can afford it.” (FGD-Kar; Participant K)

“If it is in our budget to get wakfa, we will purchase it; that is a maximum of 50 to 100 rupees.” (FGD-Hyd; Participant A)

This outcome is consistent with the findings of a previous study that the clients’ estimate of affordable pricing for three months of contraceptive injections in India and Nigeria ranges from 1.25 to 2.89 USD2, matching the approximate price reported in this study (approximately 1 to 1.5 USD).

The clients preferred Sayana Press over DMPA-IM when choosing between injectable methods34. The clients’ reported acceptability and satisfaction regarding Sayana Press was substantial28, especially during its second dose in their homes, when this trend increased significantly28. The current study confirms the lack of adequate information about its side effects and overall understanding of self-injection1,28. According to a participant:

“After having the FP injection (DMPA-IM), I had cardio issues and felt continuous pain on the side on which the injection was received.”

This study thus demonstrates the need for accurate information and counseling regarding FP methods and side effects for the successful implementation of DMPA-SC. In addition, in some countries, increased knowledge of self-injection is high; however, the uptake is low28. Hence, service access must be increased by engaging service providers, medical students, and community workers to improve the utility of Sayana Press, especially by promoting self-injection.

Conclusions
DMPA-SC can be a valuable asset and have a catalytic effect on the uptake of FP services, given adequate counseling. After training, the clients were willing to use this self-injection approach with the providers’ assistance. Additionally, they agreed to pay the transportation cost to obtain the contraceptive for free at public sector health facilities or without any transportation within communities through health workers. Clients preferred the self-injection method after training to avoid transportation and private provider service charges. Future studies must be conducted with clients who avail themselves of the services of DMPA-SC from service providers and use the self-injection method.

Practical implications
The Government of Sindh under CIP conducted a randomized controlled trial to provide the injectable contraceptives DMPA-IM and DMPA-SC (Sayana Press) through lady health workers in 2018–19, with support from Family Health International (FHI360), Aga Khan University (AKU), and Jhpiego4. Registration of DMPA-SC was approved by the Drug Regulatory Authority of Pakistan in December 2018. A rollout and scale-up plan (2019–2023) for Sayana Press in Sindh was developed with support from RIZ Consulting, emphasizing self-injection. This study’s findings can help the Government of Sindh and other stakeholders with decision-making and implementing DMPA-SC provider assistance and self-injection as they apply the scale-up plan. In particular, the present study will help policymakers address challenges regarding the fear of pain and inaccurate pricking during self-injection. Further, the information related to the affordability of new contraceptive methods will assist the government and private sector in keeping the price within clients’ budgets.

Data availability
Underlying data
The compiled transcripts of the focus group discussions have been published and are accessible at Mendeley Data, while the raw transcripts cannot be shared publicly because of potentially sensitive participant information following the decision of the ethics committee of the Institute of Business
Management (IoBM), Karachi. Data are available to researchers who meet the criteria for access to confidential data by contacting Ghulam Yaseen Veesar (yaseenveesar@yahoo.co).

References


7. Pfizer: SAYANA PRESS 104 mg/0.65 ml Suspension for Injection. 15th 2022. Reference Source


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